Ambulance TODAY

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The global magazine for all people involved in ambulance provision

IN MEMORIAM: DECLAN BRYAN DOMINIC HENEGHAN (1965-2018)


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A sudden change

Declan Heneghan
Editor,
Ambulance Today

It is with great sadness that I find myself writing my first editor's column for *Ambulance Today*. And I find myself at a loss for words as to where, or how I should begin. My father would never have had this problem: it did not matter what words were present or not – his silver tongue would soon find a way to bring you to the point of conversation he wished to elicit from you.

My father was a great man, and to almost as great an extent, it is fair to say that this magazine was an embodiment of him. Declan Heneghan and *Ambulance Today* are, and always have been, synonymous.

I grew up around my father's work. He was a journalist, but also somewhat of a social engineer. The web of people who know him across the country is as deep as it is wide, yet I suppose I see some of the deepest effects in my own neighbourhood, here in Liverpool. This is a man who has friends from every stratum of society, and the reason why is very simple in theory, yet very difficult in practice. He basically devoted his life to helping others, and those who knew him could see it in almost every action he undertook. I genuinely struggle to think of a single time where he has acted selfishly or put himself first. This can be said of many people, but there is one way in which my father differed of which I have always been proud, and that was in his absolutely fearless tenacity to pursue anything he felt strongly principled over – no matter what the threat or cost. If my father thought that a truth had to be spoken, or an act had to be undertaken, then he would storm through whatever had to be done like a hurricane. Locally, he has helped so many people in this way

through his various drug abuse and social programmes, the various charities, bodies and organisations he has either set-up or worked tirelessly with, and just through plainly being a good friend – the type of friend who would go to lengths few others would. A loyal, principled, just man. When he had an idea in his head, there was no stopping him. Moving through life, and indeed the many obstacles it threw at him, with an unstoppable force, anything that challenged him would certainly be met with an immoveable object – and those that stood behind him where covered in the shadow of his protection, provision, and his immense depths of emotional understanding.

It is with this tenacity that he approached the world of pre-hospital care. In all of you, he saw the saving graces of humanity. Those who, like he did, work tirelessly putting every last bit of themselves into everyone else. Those with an uncanny ability to relate to complete strangers who so desperately and obviously need help, and to provide that help with love and understanding, even if they are lashing out in pain and confusion. Those who sometimes give up the most vital parts of their time and life, working so that others may live in peace, comfort, and reassurance. Caring for people.

Caring for people sounds like a bit of a bland phrase, but it isn't. To do so properly, you must be able to see them without judgement. You have to be able to strip away the class, the colour, the gender, the personality even and look at one simple thing- are they good? If not, are they trying to be good? Now, in your work, this last question is, ethically, not even a question which presents itself. If someone is in the back of your bus, you treat them no matter what. You don't play God, you act as an angel instead. But, in my father's dealings, I think it is safe to say that this was the first, and often only, thing he considered. After determining who you were, and if he could see even the smallest amount of hope and love within you, then he would help with whatever was needed – and if he couldn't then he certainly knew someone who could.

It is a fond memory that I will always have, that wherever I have travelled with him, we would continually be stopped by

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this person or that person. Socially and professionally, his exuberant, intelligent, funny, warm, loving and determined personality made him somewhat of a celebrity and earned the respect of… I daren't even estimate a number as to how wide my father's various circles where.

As I sit writing this, I'm sat in his editor's chair and smoking his cigarettes. I'm sat in it, but it still feels empty. A massive hole has been left in my life, and that of my younger brother Isaac, who was my father's world. I have always had a way with words, and for the first time in many years, none fit. None are good enough. And, indeed, a great hole has been left in many other people's lives too, not to mention the global ambulance community at large. I can guarantee that the effects he has had upon our society through his tireless efforts simply just to help and love people will never be truly known. He rarely spoke about them, and I used to find most of it out when friends would bring it up in conversation with him present. Everybody knows a bit – and it will always pain me that I doubt anyone, including myself, will ever have a full picture of Declan Heneghan – for that picture is simply far too wide, detailed, and utterly majestic.

Whilst I find myself struggling for words, a shortcoming in my own eyes for his beloved editor's column in what turned out to be the final edition of *Ambulance Today* that he ever worked on… whilst I find myself lost for words I can only conclude with a couple of sentiments.

The first is that the love, tireless devotion, and stupendous amounts of selfless work that my father gave to the global ambulance community was met back with respect, gratitude, and in many cases life-long loyal friendships which similarly provided love, care, help, and understanding for him in his own hours of need. I was with him frequently when others would approach him with a quiet and reserved eagerness to be involved in his various projects, and as those conversations progressed and the potential in which these ideas could help people started to appear, my heart overfilled with pride every time. To hear how people in ambulance circles spoke of my father – always with the highest of compliments – yet again overwhelmed me with pride to the point where I found I could only stand there, quietly dumb, smiling with a simple "I know". The most common ones I ever received where "You're so lucky to have a dad like that", and "I wish I had a relationship like that with my father". I was lucky, and I am happy. My father saw the very highest of good in all of you. A section of society who devote their lives to the lives of others. People with an unmatched quiet, simple and pure goodness. I have never met an EMT who's levels of intelligence, kindness and emotional understanding haven't impressed me and won me over immediately, and so it was with my father too. It should come as no surprise then, that the entire ambulance community, both in the UK and across the world, and my father had such a deep and unshakeable friendship. It is to you all who I would like to extend my deepest condolences because, whilst I have lost a father, I know all too well that you have all lost a dear, faithful, funny and highly intelligent friend who fought for the best interests of staff and patients alike with little or no regard for himself. I am truly sorry to you all for your loss. And it is with that that I also offer my own open hand and my own respect to you all. The love and respect, the eagerness which my father approached you all with, is echoed in myself. He cannot, and will never, be replaced. But I will do my very utmost to honour him, and his relationships, as best I can.

The second is that my father, through necessity and I also believe simply through who he was as a person, was first and foremost a fighter. He would fight for everything, and anyone. And he has raised me the same way. Whilst the pain of losing the person who undeniably stood by me the most, loved me the most, taught me the most and provided for me the most – a person who turned out to be my closest confidant and best friend, who taught me just about everything in life – whilst the pain of losing that person so suddenly is so indescribable, my father raised me a fighter. I can take that pain and stand. I can work for his magazine, I can care for Isaac – the son whom he loved and protected so much, my brother. I can navigate all of this, because of him.

A mantra has made its way into my head over these past couple of days, and I think it describes the mix of strength and fearlessness that he carried, and passed onto others, fairly well. 'We may be in bits, but it doesn't mean we can't take those bits and hold them together in our hand'. That, to me, is certainly a mark of strength. And if I can live my life to be just half the man this giant was, then I will feel as though I have succeeded.

Dad, there simply aren't words. I love you.

Joe Heneghan
Editor,
December 2018

In Memoriam - Dec Heneghan

It is with great sadness that staff at UNISON heard of the sudden and untimely death of Declan Heneghan on 28 November 2018. UNISON and Ambulance Today have worked together closely for many years updating ambulance staff across the sector on important and interesting issues. Whilst UNISON staff may have changed over the years the consistent dedication of Dec has kept this important relationship working.

It is true to say that Dec knew everyone in ambulance circles and everyone knew Dec. Bringing people together and ensuring a story or an opportunity was not missed was Dec's expertise. He knew that ambulance services needed to change and modernise and kept abreast of developments around the world making Ambulance Today the industry publication of choice. He is a credit to the profession, and his enthusiasm and professionalism will be greatly missed. Our thoughts are with his family and friends.

Alan Lofthouse
National Officer
UNISON Health Group

The tragic news of Declan's sudden and utterly unexpected death has come as a terrible shock to all of those in the College of Paramedics who either knew him or were aware of his work and the publication that he initiated and edited; Ambulance Today.

Declan was a tireless advocate for paramedics and all those who serve the public within both the public and private ambulance sectors. He was also a very energetic man, brimming with ideas and constantly seeking out opportunities to promote good practice, to report on new ideas and innovations, and to generally help communication throughout the ambulance industry.

The challenges that he set himself involved unstinting commitment, many long hours of work and a huge investment of his time, expertise and personality, coupled with great skill at bringing people together and making things happen. His approach always reflected his inherent kindness, and his even-handed, positive and incredibly persuasive nature. He could talk round any individual, no matter how reluctant, into helping his cause of getting positive messages across to his audience.

He was by nature a man with a generosity of spirit and a desire to both learn everything he could about the ambulance industry and to see it improve. His method was to go out, find, and connect individuals in order to produce positive results. As a true internationalist he set out to bring stories of ambulances services in Europe and beyond to his readers, drawing comparisons and helping readers to understand what lay beyond their own experience.

In every sense, journalistically, as a friend, leader, supporter and all-round positive influencer, Declan made an important contribution and positive impact on all of those he came in contact with. His rare talents enriched many people's lives and he will be very much missed.

Professor Andy Newton; QAM, FCPara, PhD

Immediate Past Chair College of Paramedics

GOODBYE DECLAN AND REST IN PEACE

When God created telephones he must have had Declan Heneghan in mind.

For I never knew a man more adept at the art of telephone persuasion than Dec. You could guarantee that you'd need to set at least an hour aside when you saw his name flashing up on your screen but at the end of the call you would always feel like you'd had a really good chat with an old mate, while simultaneously having agreed to various requests that you'd tried desperately hard to avoid during the call.

But that was Dec's charm and his early death, at the age of just 53, is sad for so many reasons but most of all for Dec himself. Of course we will all miss chatting away to a man who had more interests and views over breakfast than most people have in a year. But to me, he was a man still packed with great ambition for his small publishing empire and the desire to rise above the same humble beginnings that I recognised myself, to be a success and to leave a legacy behind for his family.

While the legacy is still there in its many forms, it is a genuine travesty that he has been halted in his tracks by a miserable cardiac arrest. (And how ironic is that, by the way, for a man who spent most of his time talking to people about defibrillators?) It is a sad fact for many working in the ambulance service that we encounter the thin line between life and death on a daily basis – whether treating patients or reporting on it – but it never gets easier to hear that somebody has been taken before their natural time.

I first got to know Declan when I arrived at the former Ambulance Service Association (ASA) in London to help out with their magazine, Ambulance Today. I think Dec was worried that I had designs on his own empire and I received the first of many long phone calls that were to occur in the following twelve years, this one perhaps not quite as friendly as the rest. When he was satisfied that I had no desire at all to publish a national magazine in competition with his own, we became firm friends and remained so right up until his death.

It was Declan who introduced me to his close mate, the Falklands veteran Simon Weston, who he brought as a VIP guest to an early Ambition event that I staged in Liverpool on behalf of the Department of Health's Hazardous Area Response Team programme. What a night that turned out to be, including a rather tipsy Kate Adie who quickly became a big fan of Dec.

At his core though, Dec was a vociferous supporter of the ambulance service and particularly of the men and women who worked on the front line. His commitment to strong relationships with unions and staff-side meant he regularly published articles that less independent media may have been more hesitant to run.

He was also committed to helping the UK ambulance service learn from the positive work of emergency medical services from around the world, while simultaneously sharing UK good practice abroad. His magazine and website have become a genuinely interesting central point of focus for international pre-hospital care and the legacy of contacts Dec leaves behind – both within ambulance services and among hundreds of suppliers – is considerable.

Dec in his Greek office

Declan was a genuine and down-to-earth man who worked hard to achieve what he had. He was eminently generous and I am saddened that I never got around to taking up his offer of visiting his secret Greek hideaway – the place where I assumed he went to relax and switch his phones off. Not a bit of it! The Liverpool office was merely recreated in a warmer climate and the phone calls and wheeling and dealing continued unabated.

And that is how I will choose to remember Dec. In my mind's eye, I can see him in his personal Greek paradise, smiling, enjoying the sun, a drink, a cigarette and pacing the patio by the pool, mobile phone clamped to the side of his head chattering away, formulating his next big plans.

So rest in peace Dec, you have certainly earned it and you will be missed by many including me.

Carl Rees
Communications Consultant - Association of Ambulance Chief Executives
Stakeholder Engagement Lead - National Ambulance Resilience Unit
Managing Director - Kognitive Ltd

The Council of Ambulance Authorities (CAA), representing ambulance services in Australia and New Zealand, extend our condolences to Declan's family and his colleagues at Ambulance Today.

We hope the magazine and allied initiatives supporting the pre-hospital sector across the world will continue as an outstanding legacy in Declan's name.

CAA's member services have played a united and leading role in raising awareness of sudden cardiac arrest, which takes the lives of too many people across the world every day.

We dedicate our contribution in this edition of Ambulance Today to Declan.

Chris Hornsey
The Council of Ambulance Authorities

I am privileged to have been given this opportunity to publicly remember Declan, or Dec as I knew him.

I first met Dec whilst working as an ambulance technician in Mersey Metropolitan Ambulance Service in the 1980's. I recall he was writing an article on the ambulance service and how busy it was over the festive period. I remember thinking "what a very down to earth bloke and a true scouser". Over the years I followed his editorials and we met-up on numerous occasions at AMBEX in Harrogate, both professionally and socially. There was just something special about this guy who was not only able to speak on a level to chief officers of all emergency services, but also to the 'rank and file' with a true empathy about their roles. Dec was admired and trusted by all that I came into contact with during my career- I can honestly say that I have never heard a cross word said against him.

Dec always had his finger on the pulse of what was happening within the ambulance service and consistently demonstrated an empathy with whatever was currently affecting those working within the service. He was a voice for the industry- that many not only listened to but more importantly heard, and we often spoke about the improvements to the service not only in the UK but further afield.

Dec was a true professional, workaholic and a brilliant editor who just knew how to put things down in print that made an impact.

I was fortunate to have published a few papers in the Ambulance Today publication and this is where I felt they were truly meant to be.

Dec became a friend and someone I felt at ease with over a pint; I was always made to feel welcome in his home for a brew (or something stronger if I wasn't driving). Dec was very supportive of both me and my family- always wanting to know how they were.

I extend my deepest, heartfelt sympathy to Joe and Isaac for their loss, and I feel we have all lost a true friend, a brilliant colleague and a very passionate supporter of the ambulance service.

It has been an honour to have known Dec. God bless and Rest in Peace mate.

Dave Seel
Managing Director
Medical Rescue Ltd.

DECLAN

I was profoundly saddened and shocked to hear of the death of Declan. It was particularly hurtful as I hadn't spoken to him for a while and kept meaning to call as he hadn't replied to any of my recent text messages.

I have known Declan for around 10 years, but such was his enormous personality I felt as if I had known him for far, far longer.

Declan had an immediate and positive impact on me.

One of the first things you noticed about him was his passion for the ambulance service and the treatment of its staff both in the UK and abroad. His passion was infectious and before you knew it you found yourself sharing that passion too.

He put his heart and soul into producing Ambulance Today magazine promoting all that was good within the service and highlighting anything that was wrong or could be carried out better. He was especially concerned about the treatment of ambulance staff but was also anxious to seek out and highlight anything that could improve the service, be it better vehicles, systems or processes.

The other thing you noticed about Declan was the deep and abiding love he had for his sons. He always spoke about Joe and Isaac with great pride and love.

Declan's warmth, commitment and dedication were instantly recognisable.

I will miss his tremendous sense of humour, warmth and intelligence. He always made me feel that nothing was impossible and that the only thing stopping me from being the best I could be was me!

He was inclusive, kind and very, very funny and I will miss him enormously.

My deepest condolences to Joe, Isaac, the rest of his family and to the many friends of Declan who I know will miss him too.

Rest in perfect peace Declan.

Hope Daley
Ex-National Ambulance Lead
UNISON

Reflections of a friend
My memories of Dec Heneghan

I first spoke to Dec when he was setting up the publication of the West Country Ambulance Services in-house magazine. Jane and I had started Red Rose Medical Supplies and we were one of his first advertisers. We hit it off straight away on the phone, as we had mutual interests in football and other things. We met at Ambex over 20 years ago and the friendship developed ever deeper, sharing many an interesting evening, usually with a pint or a Southern Comfort and Lemonade involved.

There are many stories which will stay buried but we shared some sad times,

private family times and some amazing laughs.

My abiding memory will be a Sunday morning when Dec and his partner were staying with us and were told, "you need to be up early, as we are going jet skiing out of Langstone Harbour". At 10.00 there was still no sign of Dec or his lady so I put on AC/DCs album Back in Black, side 1, track 1, Hells Bells. After the third rather loud chime, Dec came running down the stairs in just his boxers, (not a pleasant sight!) screaming, "What was that, the earth just moved!" The speakers were against the ceiling of the lounge (the bedrooms floor) and turned up to 11! It got him up and we had a great day in Langstone Harbour.

Spending time with Dec and his sons, Joe and Dan, when they were little, playing cards and generally chatting until the small hours when they were on holiday from school. Getting Dec to talk slower because his enthusiasm would run away with him and we had to rein him in.

We kept saying we would meet up on holiday in Greece but never made it and that is a big regret but probably not for the residents around the area we were going to stay in!

Dec showed me around his Liverpool, parts that tourists don't necessarily see. He was a great tour guide, introducing me to the Cavern Club, cultural hot spots, assorted bars, clubs and his local friends.

I am really going to miss him, especially the fact I never got to say goodbye.

Ian Rose
Training Officer
London Ambulance Service

Responding to that call

It was about a year ago when the editor of an amazing medical emergencies journal, Ambulance Today, sent his greetings to those who comprise the Ecuadorian Red Cross High Technological Institute (ISTCRE).

His greetings were the opening for a great inter-institutional work between Ambulance Today and ISTCRE. After a couple of conversations, Declan, editor of Ambulance Today, and his son Isaac visited our country, in our capital Quito, and were part of our organization by working with our editorial board.

Riding along with ISTCRE ambulances we knew the best of him. His politeness, his cordiality, his experience in the best emergency systems around the world and his talent to translate into letters his best anecdotes in different prehospital settings made him one of our best friends.

Although Declan was not a paramedic, he was part of our emergency systems and as one of us he responded to several calls, willing to listen, willing to help and willing to learn.

Last week, he responded to one more call, to that final call. Last wednesday, November 28, Declan responded to that call that life makes to us when we least expect it, when we are less ready. We do not choose the place or the time to say goodbye. He didn't either.

Declan left part of his essence with us. ISTCRE and its Editorial Board would like to extend our deepest sympathies to his family, to his son Isaac and to his colleagues at this time.

With no doubt, he leaves a great legacy for all of the emergency medical responders. Thanks to him, the approach with several systems around the world will be possible, seeking to improve the skills and knowledge of each provider and, of course, replicating his extraordinary generosity and cordiality towards our colleagues and our patients too.

His humility made him an admirable man. His kindness made him our friend.

With deepest sympathy,

Dr. Víctor Malquín Fueltala, Rector

Dr. Gustavo Cevallos Paredes, Vicerector

Dr. Wagner Naranjo Salas, Editorial Board Representative

Dr. Eric Enríquez Jiménez, Research Committee

Dr. Roddy Camino Camacho, Risk Management Committee

MSc. Francisca Yánez Castro, Bioethics Committee

Lic. Silvia Quinteros Stopper, Emergency Medicine School

Ing. Rodrigo Rosero Gómez, Risk Management School

Tlgo. Iván A. Moya
Ambulance System Representative

I am sure I am not alone amongst the other writers I am in the company of in saying that the news about Declan came as a bolt from the blue and a shock. As is always the case when these events happen I started thinking back and realised very quickly that I have known Declan for so long I can't actually remember when I first met him, but I'm sure it was probably in a bar or at the dinner table of a conference or meeting - the best place for striking up new acquaintances, although not all will turn into friends.

Declan was a passionate advocate for information, research and evidence, and recognised the importance it plays in contributing to the constant efforts to improve our services and develop the paramedic profession. He was hugely supportive of the work we do in Sheffield, in other academic institutions and within ambulance services. He recognised that not everyone wants to read those dull and sometimes scary academic journal papers and so provided a platform for me, and for other researchers, to showcase our work in a format that brought it to a different and wider audience.

How big that audience has become from small beginnings in the UK to the international reach it has today - achieved through Declan's utter belief in Ambulance Today and his determination to put it on the world map.

The international interest featured in the innovative series of issues highlighting EMS in different countries. I've enjoyed reading all of those and always learn something new, but have a particular fondness for the one on Denmark. I was fortunate to be part of some of the work that went into producing that issue and I spent a few happy days hopping between Copenhagen and Malmo with Declan, his team, and mutual friends and colleagues in a whirl of discussions, conversations and visits. The success of those overseas ventures are of course down to Declan the man, not just the magazine proprietor.

How would I describe Declan? Principled, pragmatic, intelligent, plain speaking (a kindred spirit), but with integrity, honesty and an unflinching belief in social justice. And he could talk. If there were medals for talking Declan would have an Olympic gold. A phone conversation would never be less than an hour, often longer - but full of his passion and conviction for wherever the current issue was.

That was work, there were of course many other times, back to the bars and dinner tables, where the conversations drifted towards other topics and I was always astonished at the breadth and depth of Declan's knowledge on just about any subject. He was also as partial as I am to a bit of juicy gossip. We also shared a fondness for Greece - Declan so much so that he bought his own little bit of

that paradise to spend some precious downtime with his lovely boys.

Mine is one of many tributes in this issue from people across the sector. Some I will know, some will be dear friends and others strangers but there is the common thread linking and binding us all – and that is Declan. We will celebrate his successes but will not be able to escape the painful truth that he still had so much more to give, left too soon and that the world will be a little less bright without him in it.

Janette Turner
Reader in Emergency & Urgent Care Research
The University of Sheffield

Dec and Zorro

My Latest Letter

Jerry Overton
International Academies of Emergency Medical Dispatch

There are many here among us
Who feel that life is but a joke
But, uh, but you and I, we've been through that
And this is not our fate
So let us stop talkin' falsely now
The hour's getting late, hey
"All Along the Watchtower"

Dear Dec
Dec Heneghan, you were my close friend. What a privilege it is to write that, and if I wrote no more, it would be tribute enough. But alas, because of how hard these last few days have been, I simply can't stop there.

Dec, you were a real rock and roller and you appreciated that each "Letter from America" opened with some meaningful lyrics for the subject of the issue, and this letter to you should not have been any different. However, it is, because this is for you, Dec.

Yes, I know, I quoted these Dylan lyrics before, but they just seem appropriate. We knew that life was no joke, and what great straight "talkin" we did. And . . . the hour now has passed.

Remembering back, it was because of Ambulance Today that we first met. It is easy to remember your persuasive coercion that we should be a part of your vision. You must be so very proud, because you made that vision a reality, a journal now reaching those around the globe.

Dec, how I respected you because you truly gave a damn. A rarity. I cannot remember you ever placing yourself first. And your passion! What a combination when you were fighting for your latest cause. Certainly, we did not always agree and that led to some very "interesting" times, and VERY long "discussions," but in the end we always found common ground, some way, somehow, because our causes were the same, the best for the paramedics and the patients.

My God how I am going to miss you. I am going to miss those many evenings we sat at The Pilgrim, never really having dinner, drinking whisky after whisky after whisky, solving ALL the problems of the world. We tackled U. S politics, U. K. politics, world news and the economic issues of the day. In the end, perhaps it was only the economy of Scotland that we helped but we both felt just fine at the night . . . or was it early morning?

Sorry Dec, I just can't write anymore, it is too fucking hard. Usually I would end my letter with another set of lyrics, but this time will be different. You knew of my affinity for the American humourist Mark Twain and when I think of you, and this past week, there is a quote from him that immediately comes to mind. Hopefully, you will like it.

"Let us endeavour to live so that when we die, even the undertaker will be sad."

Today, the undertaker, and me, are devastated.

Slainte Mhath

Jerry

I was Chair of the UNISON Ambulance Sector for many years until about 2015 all through the Agenda for Change period and frequently met with Declan in London and at conferences. I always found him a pleasure to be with and he was so genuine and giving in all the many dealings I had with him.

He was very aware of the sensitivities that were around personalities in the profession and never spoke ill or badly of anyone. I found him to be an exemplary journalist and I am genuinely saddened to hear of his sudden passing.

Although I have been out of the ambulance world for a while I have lovely memories of Declan. He had interviewed me a couple of times and those articles were always faithful to the letter, but we met a few times just for a catch up as he was so well informed, he kept good counsel and was a pleasure to be near.

Declan is one of the people who I feel made a huge difference to the profession. There have been some premature losses recently with Dave Galligan, Craig Wilde, Roger Poole and Malcolm Woolard who all influenced the work of the profession without making a huge noise about their efforts.

Declan will be sorely missed, my condolences to his family. May he rest in peace.

Kindest regards

Joseph Conaghan

Former NHS Paramedic 1982 -2017

Chair UNISON Ambulance Sector 2004 -2015

NHS Staff Council Ambulance Member 2005- 2017

There are different types of journalists. Declan Heneghan was a journalist. Not a cheap, red top journalist or gossip columnist but undoubtedly the single most knowledgeable and informed correspondent on ambulance services, and ambulance people, of his generation.

Dec's writing for Ambulance Today was both wide ranging, sharply technical and also emotionally rounded. He wrote editorial copy like he spoke, in depth and at length.

His profound respect and admiration for the crews who dedicate their lives to saving others was a consistent feature of his work for nearly 20 years.

In Memoriam - Dec Heneghan

Ambulance Today was Dec's Opus, his masterpiece and the love of his working life, his pride.

The only thing in his life that gave him more pride than his magazine, were his sons Joe and Isaac.

Certainly, these young men have inherited Dec's compassion and urbane countenance and, I hope, like their dad will travel excessively, build relationships on every continent, and understand as much of this world as their father did.

Colleagues who work in or around ambulances have lost a champion but those of us who have come to know Dec over the years have also lost a good friend. Rest in Peace.

Joe Sheehan
MD – Ambulanz Community Partners

Ferno are deeply saddened to hear the news that Declan Heneghan died suddenly on 28th November. Dec was well known in the Ambulance industry, not just in the UK, but Worldwide.

Dec will be remembered for his immense contribution to the ambulance sector, not least as owner and editor of Ambulance Today. Dec has always been supportive of Ferno and over the years we have had the pleasure of calling him a friend; he was one of the biggest characters in the business, and the industry will miss him dearly.

Ferno have worked closely with Dec for over 15 years, and on behalf of the entire Ferno family, globally, we send our sincere condolences to Dec's family and his colleagues at Ambulance Today.

John Ellis
Managing Director
Ferno

A Decade of Dec

When first asked by Joe to write some words about his dad I was very honoured and of course readily agreed to write about a great friend and colleague. Then I asked what my deadline was and Joseph said 'needed ASAP' as Dec had been working on finalising the publication of this ill-fated edition. I couldn't help but have a wry smile as Dec and I often had precisely this conversation and even in passing he was chasing me for a deadline!

So, like many others I met Dec professionally through Ambulance Today. We soon hit it off whilst having a 'pint and a ciggie' discussing the trials and tribulations facing the ambulance service of the day.

In recent years of course that relationship developed into something more personal and important. Dec was a kind, generous man who took time to listen to people, really hearing what they were saying and placing that in the context of ambulance life.

Dec also had a passion for what he saw as opportunities to improve things, able to galvanise people into focussed, collaborative teams. Through one such project with the Helen Hamlyn Trust and the Royal College of Arts - 'Designing the Future Ambulance', I had a great opportunity to meet global leaders in the pre-hospital care such as Jaap Hatenboer from UMCG Ambulance Netherlands and the eminent cardiologist Pascal Meier, as well as many other global connections that last to this day.

Dec, had a unique way in promoting individuals and their skills - not in some superficial, sycophantic way, but in a warm genuine manner that made people feel good about themselves and their contributions.

Dec my friend, you were a true gentleman and be will sorely missed - the blue lights of the ambulance world will flash just a little dimmer for your passing.

Justin Wand
Deputy Director of Fleet and Logistics
London Ambulance Service NHS Trust

Declan called me last week when I was in Portugal, asking when I will come to Liverpool... emphasizing that I will always have a place to stay in his house. So, somehow, I have a feeling that he knew that something was going to happen...

He dedicated his life to Ambulance Today and helping others. One of the good guys. Always looking at innovation and improvement within the ambulance sector. Treating his subscribers as friends and not just customers.

He was always in a good mood, always friendly and always helping people.

We always had good time together, both in business and socially.

We all have our time to be here and our time to go. Unfortunately it was your time now. I will be missing you and hope you are happy wherever you go.

My condolences to his family.

Kari Aho
Sarco Oy

It was with great sadness that I note Declan's untimely death last week. I have known him for many years and I am aware that his background was in journalism and that initially he entered the ambulance sector producing the Western Front which was the local journal for the West Country Ambulance Service. Progressing, he became involved with the Ambulance Service Institute and published their journal.

Approximately 17 years ago he launched Ambulance Today, a journal that has grown in stature and size. Declan, through the journal, had a strong relationship with Unison and collectively strove to improve patient services.

Declan was a very colourful character and a great addition to the industry. He will be sadly missed.

Professor Sir Keith Porter
Professor of Clinical Traumatology

I was deeply saddened to hear that Declan has passed away far too soon.
Declan was a person who radiated with energy and interest and was a very inspiring person to know and a true friend.

Declan went to Denmark on several occasions and wrote great articles regarding our ambulance service which we are very grateful for.

I extend my deepest sympathies to the family.

Kjeld Brogaard
Managing Director
Falck Ambulance Denmark

It is with a heavy heart and a sense of disbelief that I find myself penning a piece in remembrance of my good friend, Declan Heneghan. We first became acquainted about ten years ago and, in what seems like no time, a firm friendship developed. His untimely passing will leave a permanent gap in my life as I'm sure it will in the lives of his many friends and colleagues not only in Liverpool, but around the world. Uppermost in my

Dec, Les Pringle and Benedict Kjaegaard with a Merlin Helicopter

mind though are his sons, Joe and Isaac. Declan's commitment to their wellbeing and happiness saw no bounds and my heart goes out to them as they come to terms with their loss. Declan's devotion to the magazine came second but was no less real. His passionate promotion of the world's ambulance services was manifested in the extraordinary levels he went to in order to bring people together.

From road staff to fleet managers to chief executives to Government Ministers, he listened to them all. He travelled as far afield as the Arctic Circle, the United States, Canada and of course all over Europe, even taking in vehicle manufacturers in Poland and Greece. (The Africa Desk is testament to his ambitions.) Future plans included New Zealand, Australia and India. And it's not that he enjoyed travelling, he didn't. It was something he saw as 'having to be done' to further his dream of building an international ambulance community able to freely exchange knowledge and ideas. I think he achieved that and it should be a lasting tribute to his memory. This all came at a cost though. Ambulance Today had to be a tightly run ship to stay afloat and as a result was never overburdened with staff. He had two loyal and much valued assistants but the workload that fell on his shoulders was enormous meaning fourteen hour days, not to mention frequently getting up in the middle of the night to make international calls.

As we all know, the worst boss you can have is yourself and, when you're also a perfectionist, it's even worse. (I once gleefully pointed out a 'typo' that had crept into one of the editions not appreciating that it would take him weeks to get over it.) Only a few people fully understood just how much it took out of him to produce a magazine to such a high standard and consistent quality. I know that Dec would have demanded that I should extend a huge and heart felt thank you on his behalf to all the loyal readers and contributors who together made Ambulance Today such a huge success. He never lost sight of the fact that his chosen path was ultimately all about people and I think the magazine reflected that. On a final and more personal note, there is something I am going to miss greatly in a perverse kind of way. Declan knew that I was never one for early nights and would occasionally give me a call after finally switching off his computer. The problem was that the end of Declan's day was invariably around midnight. I would be contentedly anticipating bed when the phone would ring.

It could only be Declan. "Hi, mate. Are you OK for a quick chat?" I would hesitate. "Well actually I was just about to..." The ensuing conversation would ramble and range for an hour or more but it would always be lively and stimulating. Eventually, drained and blinking, I would make my way up to bed. I won't get those calls any more. That hurts. By chance it's midnight as I write this and oh wouldn't it be great if the phone were to ring with that familiar Liverpudlian voice on the other end saying something like... "Hi, mate. Have you got five minutes?"

Les Pringle

Ex-Paramedic – West Midlands Ambulance Service

Former Ambulance Today Correspondent

I met Declan Heneghan (Dec) for the first time at the Ambex Conference in Harrogate. At the time I was the lead negotiator for NHS ambulance staff in the UK and I had been invited to speak about how we might improve Industrial Relations. Dec was invited in his capacity as editor of the West Country Ambulance Service magazine. Dec lit up the room with his smile and his unforgettable chuckle and his energy and enthusiasm was infectious. In those days some 20+ years ago, Dec had hair on his head and I was a glamorous size 12. Dec and I hit it off immediately and we spent several hours together in the next few days, talking, singing and dancing.

Dec told me all about his dream to produce an ambulance magazine, that would be read by everyone in the UK who was involved in the ambulance services. Dec wanted to produce a publication that would inform, encourage, educate and lobby on best practise and innovation in ambulance service delivery.

This was a very tall order during a period of difficult industrial relations; there was also competition, rather than collaboration, between the newly formed Ambulance Trusts and the Government had introduced the Privatisation of Patient Transport Services (PTS).

Dec was undaunted, he lobbied, cajoled and persuaded people to make his dream a reality. Dec wanted contributions and sponsorship from every facet of the service. Meanwhile he used his considerable charm and influence to highlight the work of the people who delivered the service, be that in control rooms or on the road.

I remember Dec at his persuasive best when I joined him in 1999 in a meeting with Piers Morgan (at that time editor of the Daily Mirror); when he convinced Piers to run a competition in the Daily Mirror. The competition called on readers to nominate an ambulance Millennium Star.

The editorial reminded readers that whilst they were celebrating the arrival of the new millennium; ambulance crews, control staff and managers would be saving lives and looking after the sick and injured, on the busiest night in the history of the ambulance service. The public responded in their hundreds with tales of heroism and kindness that were over and above the call of duty. Those of us on the panel, which included Piers, Dec and me, were tasked with finding one outstanding candidate. The task proved to be impossible; we concluded that they were all "Millennium Stars".

In Memoriam - Dec Heneghan

Dec, Maggie Dunn and Isaac

Dec was an even tempered, kind and gentle man as well, but when he was moved to anger it was best to stay out of the way until he had calmed down. I remember an incident in Northern Ireland during the troubles, when an ambulance crew came under attack when they went to attend a person who was injured during a sectarian exchange of gun fire. Dec was incandescent with anger and yelled through his columns (Dec was also a freelance journalist), and on the radio, his condemnation of the factions on both sides who had put the lives of lifesavers at risk.

Many people who have been invited to write a few words about Dec will have their own memories to share about the man who was "Ambulance Today". I know we all remember him as a prolific, passionate, prosaic and talented writer, and defender of the NHS Ambulance services. I remember the other Dec with love and warmth too. Dec was above all else a family man and nothing was more precious to Dec than his boys. Dec was a single parent who loved his boys unreservedly. It was impossible to have a conversation with Dec for more than two minutes before he talked about his pride in his sons' achievements and his admiration for what honourable and decent young men they had become.

I watched the boys grow up and they visited me in London. Dec's eldest son Joe reminded me when I spoke to him following his Dad's death that they called me their "London Granny". I am happy that the last time I saw Dec, just a few weeks ago on the day before his youngest son Isaac's 16th birthday, we sat in the autumn sunshine with a glass of wine and shared some of our memories with Isaac. Dec was happy and content. His magazine is now read all over the world and I still get my copy in the post.

In the early days UNISON was proud to sponsor and contribute a column in Ambulance Today and I'm delighted that UNISON continues to support and contribute to every edition. I think the magazine is unique, because it brings together contributions from trade union representatives, managers of the service, innovators, trainers, equipment providers and manufacturers, and private ambulance providers - not just in the UK but across the world.

Dec has left us a legacy which I hope will be nurtured and continue to grow. Our lives will be impoverished by Dec's death. I shall miss my friend, but I will treasure my fond memories of him, the magazine and above all else his boys.

Goodbye Dec.

Maggie Dunn – Former National Negotiator for Ambulance, UNISON

What tremendous sadness we all felt at the news of Declan's passing last week. So full of life, so engaged with his work and so immersed in the ambulance community was Dec, that it is hard to imagine who could possibly fill the gap he leaves behind. His networking capabilities were legendary and his commitment to his craft unstinting. Those who did not have the opportunity to work with Dec will find it hard to comprehend what it was to be in his company, and to witness at first hand his ability to bring people together. I consider it my great privilege that I did.

Mark Webster
Vice President - International Operations
ZOLL Medical Corp.

Our friendship with Declan Heneghan began in Harrogate at AMBEX 2002 and grew initially from a mutual, heartfelt desire to improve all aspects of the delivery of ambulance care within the UK ambulance service.

Declan's passion and dedication to ambulance staff is widely known. His energy, communication skills and the knowledge gained through his numerous ambulance contacts has provided and enabled a platform of open communication to develop between staff, ambulance trusts, training institutions and ambulance equipment suppliers. Ambulance Today has evolved from a vision to provide a quality, specialist magazine for all UK ambulance service staff into what is today – a first class, well respected, specialist global vehicle for the provision of quality ambulance care for ambulance staff worldwide - whether they are members of an ambulance trust, private ambulance service or voluntary service.

On a personal level our friendship developed alongside the growth of Ambulance Today. We met Dec's sons in in 2005 and have many happy memories from shared trips around Liverpool and Derbyshire, visits and meals around each other's tables including his own Heneghan recipe for Scouse, a Christmas Meal for Heneghans, his local and Dutch friends, and those involved in the magazine (in November!), and Chocolate Biscuit Cake. We were honoured to be welcomed as a part of the Heneghan family and to include them in our own.

Declan possessed two great talents. The first was the ability to bring together people from all levels of the ambulance world, giving them a forum for positive, constructive communication in areas as diverse as innovative ambulance and equipment design, skills, education and training. The second, in passing on his passion for all things ambulance and having the vision to see the talents of others and to encourage them to become part of the wider Ambulance Today team.

The Annual Christmas Lunch was used as an opportunity to gather an eclectic mix of family, and friends, Ambulance Service members – from PTS to Chief Execs, medical equipment CEOs, paramedic instructors and guests from ambulance services of other countries – to name but a few - in a social setting. Discussions started at lunchtime and often lasted until early the next morning.

Declan wasn't only the highly respected founder, editor and owner of Ambulance Today, he was also very family orientated – Dec to his close family and Dad to his beloved sons who came first in everything. He was so proud of them and of their achievements. To his many friends he was always steadfast and supportive to their needs.

We were sorrowed to hear of his death on Wednesday and are so deeply saddened by Dec's loss but feel we must celebrate his life and commemorate all he has

achieved. He will be greatly missed by the ambulance world. Rest In Peace, dear friend.

Maurice & Elizabeth Haslam
Ex-National Ambulance Lead
UNISON

Declan was a wonderful friend to us at Miles Smith and his death is a real tragedy for the industry. Declan was a leading figure within the ambulance sector, who's passion inspired so many. The industry will be a sadder place without him. Our thoughts are with his family, friends and colleagues at this very sad time.

Annie Wakeman and Grant Irwin
Miles Smith Insurance

We were shocked and very saddened to learn of Declan's sudden death. Through his vision, leadership and tenacity Declan was able to grow Ambulance Today into a truly global voice for EMS that is advancing and strengthening paramedicine in countries around the world. Those of us who knew Declan personally recognize that he was a very special individual who genuinely and deeply cared for those who serve patients in the field. On behalf of everyone at NAEMT, we express our deepest condolences to the Heneghan family.

Pam Lane, NAEMT Executive Director

It is with profound shock and sorrow that I am sharing my thoughts on the sudden and tragic death of my dear friend Declan, or Dec as we fondly called him. Dec exemplified the grit, determination and devotion of purpose in establishing Ambulance Today as the leading magazine and portal for ambulance professionals internationally over the last 15 years. His knowledge about the sector was second to none and he considered his work as a 'service' for the betterment of the ambulance profession. We both shared the same passion to make a difference, in our own ways, to the professionalisation and modernisation of the ambulance services and supporting their staff. His true legacy is creating a platform to bring the global ambulance community together and I am confident that his son Joe and the team will continue to take Ambulance Today to greater heights.

Professor Paresh Wankhade
Professor of Leadership and Management
& Director of Research
Edge Hill University, UK

Dec and Isaac

Dec was a rough diamond who's persona shone brightly across the emergency medical services world. He was, without doubt, a people's person and there wasn't a key opinion leader within the industry that he didn't know or he hadn't canvased.

He had the ability connect with people on all levels; be it a CFR or CEO his drive and passion to promote all things EMS was evident to all.

Personally, I had the pleasure of knowing Dec for many years and we would often share stories and a cigarette (or three!) at the many trade shows that we would frequent alongside Joe and, more recently, Isaac.

Dec, you'll be sorely missed. And I'd like to say thank you, give you a big hug for all the blood, sweat, and tears you've shed in your efforts in getting the second best ambulance magazine (behind the SP Services catalogue!) to EMS professionals across the globe.

RIP to a true gentleman.

Paul Watts, SP Services

I retired from my full-time work with the NHS nearly 30 years ago, but my great interest in Resuscitation Medicine has led to my maintaining contact with the ambulance service in a continuing capacity as an honorary medical advisor to SECAmb. This involves activities such as giving lectures, attending a limited number of other meetings, and looking at transmitted ECGs to check for anomalies and defects.

One of the privileges that this responsibiliy brings is contact with ambulance personnel and with others whose activities are closely associated with the service. Ranking very high in this latter category has been Declan Heneghan who, working with his son Joe, has produced for some years the journal Ambulance Today that enjoys a wide circulation in Europe and indeed further afield. Its content is relevant, up-to-date, and extremely useful not only for news content but also for guidance and advice for the service, much of it written by leading experts in the fields it covers.

I have been deeply upset today to learn of Declan's untimely death from a heart attack, and feel an urge to pay my tribute to a great man who had boundless energy and served as an example to many, though few could ever match his contributions to the service. To me, he was a friend, and one whom I will never forget.

Douglas Chamberlain CBE MD FRCP FERC FESC (Emeritus)

Each of us has had that experience in our lives of meeting someone who makes a profound impact on us. Be it the national figure who exhibits some amazing talent, a family member who guided us in some way or, in my case, Declan Heneghan.

I was the director of a hospital-based EMS service in Texas when I first connected with Declan in 1999. Dec was working on a product review for the EMS magazine he published, and Trevor Sams of Physio Control told Dec to call me. Those of you who know Declan can imagine that with his thick Liverpool accent and speech style, I had a bit of a challenge understanding the conversation at first. However, what was initially lost in translation was quickly found in friendship. That phone call 19 years ago sparked an enduring friendship with one of the most unique and dynamic people I've ever known.

When my phone rang last week and I was told of Declan's passing, a great sense of loss struck me, for one of those very special people in my life was gone. I'm sure many of you feel the same.

Because of that first phone call with Declan in 1999, I have had the wonderful opportunity to visit the UK and present at EMS conferences. I've built relationships with many folks who were and are part of the UK EMS system.

In Memoriam - Dec Heneghan

Now let me be clear, our friend Declan was by no means a saint or model citizen. And if you asked him, he would be brutally honest about some faults in his character. But what I will forever remember Declan for is the love he had for his sons, Joe, Daniel and Isaac. No matter what the conversation topic of our phone calls, they would always end with Declan telling me how proud he was of his sons and how they were doing.

A phone call from Declan also is a source of deep regret for me. A few weeks ago, Declan called and left a message for me. He asked me to give him a ring back. He said he knew I was busy and traveling a lot, but he wanted to talk about an idea with me. I lost track of that call and did not get back with him. Last Wednesday, I didn't get a call from Declan but about him.

So Dec, my apologies for not calling you back. If you will just remember what it is you wanted to talk about, we will see each other again one day. I promise to listen then.

Godspeed, my friend.

Randy Strozyk
Executive Vice President
American Medical Response, Inc.

How I met Declan

In January 2011 Declan was strolling through the streets of his beloved Amsterdam, when on the Leidse Square (the main outgoing area) he stumbled upon an ambulance. Being the editor in chief of an ambulance magazine, his interest was aroused and with his very well developed social skills, he immediately had a good chat with the crew. The idea to dedicate an issue of his ambulance magazine to the Dutch system was born: "Let's go Dutch!" Now Declan always has a very thorough approach, so he asked different people for information and one of them happened to be me, for I had made some name in researching the history of the Dutch ambulance service.

Our first meeting was a big success. We got along very well and Declan did me the very big honour to let me write the editorial of the issue of Ambulance Today called 'Let's go Dutch'. Apparently he appreciated my contribution and he asked me to become regular columnist of his magazine. With great pleasure I wrote columns for every issue of Ambulance Today about a wide range of subjects concerning ambulance care. Declan gave me complete freedom

Dec in conversation with Thijs Gras

in what I wanted to say, sometimes indicating an issue would be dedicated to a certain subject or land (like Denmark and Canada, so I could focus on my Danish and Canadian experiences).

With his usual kindness he welcomed my contributions with great enthusiasm, polishing my rusty English, correcting grammatical mistakes, proposing slight adjustments to make my message clearer.

Meanwhile we built a very warm friendship. Declan visited me and my wife Barbara several times in Amsterdam and grew fond of our two kids, José and Niels. They loved him too and considered him to be a sort of uncle. It was a very big and pleasant surprise to embrace him in person on my 50th birthday in 2012: he had come to Amsterdam with Les Pringle, his good friend. The ties got closer as we met and let into our hearts, Declan's two sons, Joe and Isaac. Looking back it is peculiar to find out we knew each other for only seven years. It feels way longer, so much trust and common ground was found already.

In December 2017 Barbara and I were very lucky to attend the famous Christmas lunch Declan organized for the people involved in his magazine. It was a great experience and you could see Declan enjoying every minute of it, although it was quite a task to organise it all.

In the beginning of this year, we as a family still did not have plans for our summer holiday. Declan insisted we should come to Greece and visit him in his apartment in Polychrono. Well, why not? We booked houses in Polychrono and had a lovely holiday, thanks to Declan and Isaac. They introduced us to some lovely people, gave good advice about restaurants and activities and, most important of all, feasted us with their good company.

The news of Declan's passing away came as a big shock. Literally the day before I had a fairly long conversation with him over the phone, discussing some family issues. Declan gave sound advice and offered his help, which, coming from him, is always very reassuring.

One cannot overestimate the contribution Declan made to ambulance care in an international perspective. He brought people together. With his magazine and his enchanting personality, he created a network of dedicated ambulance people stretching all over the world. His death means a tremendous loss to the international ambulance community and of course to all his family and friends.

Dear Declan, wherever you are, you are everywhere and although you never go away, we will miss you enormously ....

Thijs Gras
Paramedic, Ambulance Amsterdam

It was with shock and great sadness that I heard the news that Declan had passed away. My condolences to all his loved ones. I have been lucky to be able to call Dec my friend for over twenty years. He lived life to the full and knew the value of both hard work and fun. In this uncertain world he was a man who always showed loyalty, integrity and kindness. I will miss him greatly.

Richard Boatwright, EVS Ltd.

I was shocked and saddened to hear the terrible news of Dec passing. I've known Declan for about five years and in that short time he had become a good friend. We probably met up only a handful of times in those five years but would keep in touch by phone and he would leave me the longest voicemail messages if we missed each other.

He was a kind and generous man. He was a great journalist who was an expert in the ambulance world, creating the best ambulance service magazine in the industry.

He will be sadly missed, taken far too young and I will miss those voicemail messages!

Sarah and I are sorry for the Heneghan family's loss.

Ross Bundy, SECAmb

Over many years Declan built up an impressive lists of contacts with ambulance leaders both across the UK and further afield. His recent work in Europe, USA, Israel, South America and Australasia/ New Zealand highlighted his energy and determination to share 'ambulance' stories worldwide.

His work ethic was determined to say the least. When Declan wanted to speak with you it was hard to say no. He spoke a variety of English unfamiliar to many but would always persist until you understood his point of view! He was dogged, well informed, tenacious and absolutely dedicated to connecting all those interested in ambulance and EMS services. He will leave a unique Declan shaped void that won't be easily filled. It may be clichéd but he was 'one of a kind' and will be greatly missed.

Steve Irving
Executive Officer - Association of Ambulance Chief Executives.
Ambulance Leadership Forum & JRCALC support.

Declan was highly thought of by all who knew him in the ambulance market and his passing is a great loss to the industry. He was a true friend who worked tirelessly in the ambulance world and will be sadly missed, not just by those of us who worked closely with him but by the thousands of readers of Ambulance Today. Our thoughts are with his family at this very difficult time.

Steve Shaw
Commercial and Operations Director
Cartwright Group

I, like lots of other people, will have been totally shocked to be told of Declan's death at the age of just 53. In my case, my phone went and it came up as 'Dec, Ambulance Today'. Now about this time of the year, I and a few other friends would get a call to organise a date to meet up for Christmas dinner. So, with that in my mind, it was, "Hi Dec you ok?"

It wasn't Dec, it was Paul, and I was informed that Dec had unexpectedly passed away. To say I was shocked was an understatement and I still have problems in believing it to be true. His loss to me, and lots of others and the ambulance service world is immeasurable. Ambulance Today has a subscription of about three quarters of a million people and that's excluding the hard copy magazines and the pass it on process.

Well where do you start in talking about a man who is known all over the ambulance world? I have known Declan since about 1994, from back in my Mersey Regional Ambulance Service days (MRAS). I got to know Dec through a friend and that grew over the years. As the Vice Chair of what was then The Ambulance Transport Advisory Group (ATAG), that being a sub-group of the Ambulance Service Association, I took on the role of writing about our group's work and also in being asked, over many years, to write reviews on vehicles, equipment, Central European Norm (CEN), European Whole Vehicle Type Approval (WVTA) or European Small Series Type Approval (SSTA). Decontamination units, The HART vehicles, Make Ready schemes, PPE, Uniforms, Electronic Patient Report Forms, working with what was NHS supplies, all the main body builders and equipment manufactures, and the New Ambulance design project with the Royal Collage of Art (RCA) to name but a few. Declan and Ambulance Today were one of the key links in the communication process to the staff on both emergency and patient transport services and the respective unions of the time. Without Ambulance Today, there would have been no way for us to communicate in the way that was needed.

One thing about Declan was he knew the ambulance service inside out and, if he needed to ask for help, countless numbers of people would put their hand up to give support. He was the type of person not afraid of putting his head above the parapet and he put his heart and soul in doing his best for our staff at the sharp end of the emergency services. He has interviewed the vast majority of the CEOs and was never afraid of asking some difficult questions. Declan has run Ambulance Today with an all-inclusive attitude. He has set up and funded forums for every aspect of the service including our brilliant staff on the road, their issues of dealing with violent patients, PTSD, taking these issues through to the Chief Ambulance Officers of yesteryear, to our Chief Executive Officer CEO of today, and including the Ministers of Health. In the ambulance service, it's known as being part of what is called the Green family. Declan may have never worn a uniform or worked on an ambulance, but I don't know many people who have done as much for the world of ambulance services

Dec, Tony Cowley and Alan Murray

- to improve patient care and shape the working lives of our precious ambulance staff - as he did. He transcended journalism and, for many, he was one of our own.

So, in the same way as we say in losing an ambulance colleague, 'time to switch off that computer and phone; time to return to base for a well-deserved rest'.

Job Done.

RIP Dec oh my God you will be missed.

Tony x

Tony Cowley
Former General Manager of Operational Support Services – MRAS & NWAS
Former National Fleet and Logistics Manager - WAST

I have known Dec for only a few short few years but in that time he has had an impact on my life in so many ways. His openness, compassion and empathy always shone through, and then there was his love for a profession that I hold very dear, and our mutual love of football and Liverpool; this all added to create an environment for a unique bond to grow. Our skype chats – when we could have them – were awesome, although our work schedules, travel and Dec's unerring ability to always stuff up technology made for interesting times. I will miss him and, as I write this, tears stream down my cheeks for all the times we will not have. But I do know that Dec would want me to focus on the times we had, the memories we shared and the stories we told (and those that still need to be told and written – I will honour you in them buddy). I think it is fitting that Liverpool is Red from this past weekend, it is what Dec would have wanted, and in the words of our favourite team – You'll never walk alone, mate, and neither will I.... love, peace and kindness to you all.

Regards Michael Emmerich
Africa Editor
Ambulance Today

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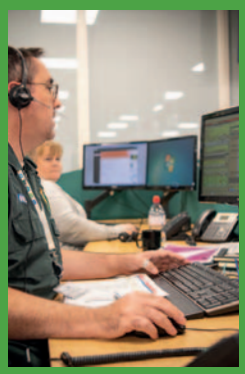

all ambulance staff

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It is not okay to assault NHS workers

By Alan Lofthouse
National Ambulance
Officer, UNISON

Ever since NHS Protect was abolished in 2016, UNISON has been campaigning to keep violence a priority issue. With no national body responsible for violence it leaves employers solely responsible, managing the risk to their staff. Anyone working within the ambulance service will know by bitter experience that levels of violence and aggression are on the increase.

So, it was important that UNISON was involved in pushing for tougher legislation to prosecute those who think it's ok to assault staff. Following a year of work with politicians we are pleased to see the Assaults on Emergency Worker (Offences) Act 2018 come into force in mid-November and we will be watching closely to see how the police, CPS and courts use the new law. In simple terms, the new legislation gives courts the power to aggravate an assault against an emergency worker (or someone supporting them) and covers most NHS staff.

"An assault on any individual or citizen in our society is a terrible thing, but an assault on an emergency worker is an assault on us all. These people are our constituted representatives. They protect society and deliver services on our behalf. Therefore, an attack on them is an attack on us and on the state, and it should be punished more severely than an attack simply on an individual victim".

Minister of State at the Ministry of Justice

Along with this news was the announcement by the new Secretary of State for Health and Social Care, the Rt Hon Matt Hancock, around a new violence reduction strategy.

Matt Hancock, Secretary of State for Health and Social Care, said:

"NHS staff dedicate their lives to protecting and caring for us in our times of greatest need and for any one of them to be subject to aggression or violence is completely unacceptable.

I have made it my personal mission to ensure NHS staff feel safe and secure at work and the new violence reduction strategy will be a key strand of that.

We will not shy away from the issue – we want to empower staff and give them greater confidence to report violence, knowing that they will see meaningful action from trusts and a consistent prosecution approach from the judicial system".

We welcome these strong political messages but now we need to ensure this is not just mere rhetoric and that meaningful change happens. The NHS Social Partnership Forum is the group where trade unions, system leaders and employers meet to discuss better ways of working. The issue of violence and what employers need to do, and how the system needs to change, will be monitored through this group.

These developments have come about due to the involvement of trade unions with UNISON taking a lead role as the main union representing ambulance and wider NHS staff. We are uniquely placed to ensure employers take their responsibilities seriously. For ambulance staff this means ensuring you have the right training and the right support.

Of course, in an ideal world we wouldn't want any ambulance worker to be assaulted but we know this simply isn't possible. Trends in society show increasing levels of violence against all workers and emergency service workers, along with NHS workers, bearing a disproportionate level of this violence.

Let's talk straight. Assaults are life changing. A sexual assault leaving a victim fearful of being alone with patients, or a lone worker forced into a corner of someone's living room and threatened with a knife leaving them with depression, anxiety or PTSD, or the physical injuries of a sustained assault – all of these have happened and will continue to happen.

No amount of political support will prevent these kinds of incidents from happening, but we can work to reduce the harm that is caused through an incident. Nationally the rates of violence need to be measured and reported. Employers must be held to account by their efforts.

Information must be passed to ambulance responders to help them do a "dynamic" risk assessment, and if necessary, withdraw and seek police response.

We need to equip our staff with better training of how to spot danger, reduce conflict and de-escalate tension. There are several trials of body worn cameras being done by ambulance services. We would like to see the results of these trials and speak to the staff about their experiences before deciding whether they are a good solution to the problem. I don't want system leaders to be distracted by a new law and technology and feel they have done enough.

And that leads me to the final thing I would like to see. I want to see more employers giving strong messages to their staff about their commitment to reducing violence. Telling staff that they will do everything in their power to prevent an assault. They will provide them with safe working practices and support their decisions to withdraw or withhold treatment.

And we need all staff involved in an assault to be supported by their employer. That it will be counted as a work-related injury, they will be supported in their decisions during the incident and, importantly, they (and their families) will get the physical, emotional and psychological support they need to recover.

And in circumstance where despite everyone's best efforts an assault happens, we want to see the new law used to prosecute offenders and send the message out that it is not ok to assault ambulance staff.

Alan welcomes feedback from ambulance staff and can be contacted at:
Email: a.lofthouse@unison.co.uk
Facebook:
Facebook.com/unisonambulance
Twitter: Twitter.com/UNISONAmbulance

ALF 2019: Book your seat at the top table of UK Ambulance Services

The Association of Ambulance Chief Executives Ambulance Leadership Forum (ALF) 2019: 19-20 March, Chesford Grange, Warwickshire, UK

Organisational development, the Carter Review of ambulance services, Project 'A' and Leadership in the ambulance service are just some of the hot topics on the agenda for the 2019 Ambulance Leadership Forum in March 2019.

Organised and managed by the Association of Ambulance Chief Executives (AACE) this significant event allows senior managers, suppliers and others with an interest in the effective management of ambulance services to join forces and share ideas and best practice in a supportive and high-profile environment. In short, it offers a direct route to the top table of those managing UK ambulance services.

Speakers

The Ambulance Leadership Forum has become one of the most significant dates in the ambulance service calendar and among the line-up of speakers for 2019 are:

- Professor Michael West – expert in developing compassionate organisations / leadership
- Helen Bevan – NHS Horizons
- Chris Hopson – CEO NHS Providers
- Mark Gough – NHS Improvement
- Henrietta Hughes – National Guardian, Freedom to Speak Up
- Helio Vogas – Effective leadership
- Many others yet to be announced

The Secretary of State for Health Matt Hancock has confirmed he is delighted to be invited and keen to participate subject to parliamentary business. (Please note all speakers are subject to final confirmation/cancellation).

Places at this important event go fast, so don't delay.

As ever with this high-level conference and networking event, ALF 2019 is open to all with an interest in pre-hospital urgent and emergency care – clinicians and senior managers through to directors and board members of NHS and associated healthcare bodies, as well as suppliers. Conference and ALF Gala Awards Dinner bookings are now being taken at www.aace.org.uk/ALF so **reserve 19-20 March 2019** in your diary now. Member trust attendees should seek registration through their CEO's office.

Sharing best practice

Day One will focus on the main conference programme while the morning of Day Two will again feature

12 separate sessions across three concurrent conference streams to allow focused groups to learn and exchange ideas of particular interest.

The ALF Gala Awards Dinner 2018

On the evening of Tuesday 19 March 2019, AACE will host the ALF Gala Awards Dinner to which all are welcome. Dress code is business suit / smart casual (uniform or black tie is not required). As always, the Gala Awards Dinner will be an excellent opportunity for Ambulance Leadership Forum attendees to applaud excellence, discuss developments from the last year, and network with colleagues. We anticipate a great opportunity for social and business engagement at the event, with a special guest host for the night.

However, most importantly, the evening provides an opportunity for AACE and colleagues to recognise members of staff from across all UK ambulance services who have provided truly outstanding service, going above and beyond the call of duty in a variety of categories that represent the whole breadth of service delivery.

Research papers

For the first time in 2019 at ALF we will feature five presentations at the conference on research papers relevant to ambulance service delivery and leadership (a call for abstracts is on the ALF web page at www.aace.org.uk/ALF). Delegates will also benefit from poster displays of best practice and innovation from around the UK as AACE member services highlight areas of local practice that have potential national significance.

Global Paramedic Leadership Alliance (GPLA) 2019 Summit, 21-22 March

The Global Paramedic Leadership Alliance brings together a firm commitment between ambulance associations from the UK, Canada, America and Australasia to share best practice and research across a wide range of topics and especially to ensure that mental health stigma is mitigated across the pre-hospital care arena. This interesting networking event will take place during the two days after ALF at the Chesford Grange Hotel. Separate booking is required and details are at: www.aace.org.uk/ALF.

The venue – Chesford Grange, Warwickshire, UK

Chesford Grange is one of the most accessible and well-appointed conference venues in the West Midlands, being close to major road networks including the M40, M42, M6, M69 and M1. It has been traditionally popular with ALF delegates and has over 650 free car parking spaces and high quality free wi-fi for all delegates, as well as an indoor pool and fitness area.

Thanks to our sponsors

We are delighted to announce the main commercial partner for ALF 2019 will be Intermedix and we also extend our sincere thanks to the main sponsors Priority Dispatch, Working Time Solutions, ORH, Babcock International and RDT for supporting the event.

More details

For more details contact Steve Irving at AACE on 0207 783 2036 or via steve.irving@aace.org.uk

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[1]Acosta JA, et al. Journal of the American College of Surgeons. 1998;186(5):528-533.

MCN IP 1601 0092-05

The beating heart of South American ambulance care

By Declan Heneghan, Editor of Ambulance Today

My fact-finding visit to Quito, capital of Ecuador and home of ISTCRE and CREMYAP took place over Easter, an important time in the South American calendar, since the region is still predominantly and passionately Catholic. My travelling companion was my 15-year-old son, Isaac. Our mission during our week-long visit was to learn more about the workings and mission of ISTCRE, South America's biggest and best paramedic training organisation, and its off-shoot, CREMYAP, which now leads the way in developing prehospital clinical research across the region. Witnessing ambulance delivery in a country where resources are scarce reminded us that the best people in ambulance are those working in the harshest conditions, facing the most difficult challenges. Along the way we fell in love with a country whose ambulance people possess a spirit as rugged and beautiful as its imposing volcanic Andean landscape.

1. First Impressions:

We landed in the Pichincha province in the Northern Sierra region of Ecuador during the late afternoon on Holy Thursday. We were met by our hosts, Dr Mauricio León, Director of International Relations (and one of the founding team of ISTCRE) and Iván Moya, their International Relations Representative and also a working paramedic.

During the half-hour drive through La Sierra, the Andean highland region of Ecuador, into the centre of Quito we were struck by the sheer beauty of the towering snow-capped volcanic mountain ranges that surrounded us on either side. Despite the fact that the weather was cloudy, rainy and exceptionally grey it was breath-taking. Exhausted, we booked into our hotel and went straight to bed.

2. Good Friday Daytime – Crowds, Religious Spectacles and Sun-Burn:

We awoke on Good Friday to be met with bright Spring sunlight. Our host, Mauricio León, met us after breakfast. We were to spend the day observing Cruz Roja providing medical cover for the second biggest annual public festival in Ecuador, Quito's Jesús del Gran Poder, or "Jesus of Great Power" procession, which over five decades has grown into one of the largest and most colourful Roman Catholic Holy Week events in Latin America. Attracting over 300,000 visitors from all around the country and beyond the procession celebrates the Agony of Christ and consists of around 40,000 participants, most clad in purple silk robes, who proceed from the Basilica in the Old Town to the city's most impressive cathedral, San Francisco, situated in a vast square, reminiscent of the Vatican. Many of the participants carry staggeringly heavy crucifixes, others wear barbed-wire which cuts into their naked skin, while still others flagellate themselves as they proceed through the Old Town's steep and narrow cobbled streets to the echoes of scratchy religious music which blare out of randomly-placed speakers scattered along the route. Remarkably though, participants pay a fee of between $15-30 US dollars for the privilege of putting themselves through this ordeal which, to put it into context, is a week's wages

February 19, 2004 was an important date in modern Ecuadorian history. It was the day that the Ecuadorian Red Cross High Technological Institute (ISTCRE) came into existence due to the resolution of CONESUP RCPS04-070.04.

ISTCRE was the brain child of its visionary founding Rector, Ing. Javier Sotomayor, M.M.Sc, a dedicated Red Cross project leader who, having worked in disaster areas in other world regions, realized that his own country of Ecuador, prone to earthquakes and other natural disasters and at that time without any kind of national ambulance service for its largely poor population, urgently needed a free-to-access ambulance service, better training for paramedics for all of South America, and a strategy to develop prehospital research.

The result of Javier's passion and determination was the creation first of ISTCRE and then in 2014 of CREMYAP (the Regional Reference Centre in Medical Emergency and Prehospital Care). Fourteen years later both amazing bodies have changed the landscape of Ecuadorian ambulance care and influenced ambulance care across the whole South America region, since many South American countries now rely on ISTCRE to train their paramedics to a level of clinical excellence previously only dreamt of.

Editor's Overview of Ambulance Care in Ecuador

for some locals. Those who crowd the pavements to watch the procession treat the day as a jolly Bank Holiday festivity, bringing hampers or buying snacks off the numerous street vendors who jostle for position on every street corner.

ISTCRE's role involved supplying a number of Command & Control units and other EMS vehicles carefully positioned at key points on the route and providing a couple of hundred fully trained paramedics or volunteer medics who keep an eye on the ever-increasing crowds for those who faint, suffer sun-stroke, sprain an ankle or worse yet, are unfortunate enough to find that today is the day for their long overdue but unexpected cardiac arrest. As Maurice explained when we arrived at the Basilica where the main unit was stationed: "Our main concentration is on hydration so throughout the route we position booths which gave away free bottles of water." As we followed Maurice and Ivan around the route we were spell-bound by the sights and sounds, particularly some of the colourful, intricate and huge religious icons festooned with flowers which were carried on the shoulders of teams of up to 20 people depicting Christ or the Virgin Mary.

In fact, despite the massive crowds the day mainly consisted of treating sprained ankles and dispensing water. Thankfully no serious crimes or medical incidents occurred so the Cruz Roja team could pack up and go home for a rest before preparing for an equally busy evening. Our memory of the day was of the colour, the friendly atmosphere, the sheer exuberance of the crowds and the cheerful efficiency of the Cruz Roja team along the route.

3. Good Friday Night – Ride-Along from the Inca Station

After a couple of hours rest and a light dinner Ivan picked us up from our hotel and took us to one of Quito's two main ambulance stations, the Inca Base station on Avenue 6th Decembre in the North of the city; based within a socially mixed neighbourhood, it serves some of the poorest and most troubled communities on the fringes of the city, both economically and socially.

Normally housing two ambulances, one of which is a specially-equipped rescue vehicle used particularly when tourists or locals get lost in the surrounding mountain ranges, the Inca station is usually manned by around 10 people per shift, consisting of a mix of qualified paramedics and volunteers – usually ISTCRE paramedic trainees at various stages of their training – it's modestly scaled with two of those personnel manning a dispatch desk in the corner of the small recreation room while the others either sleep in an adjacent dormitory or drink coffee and watch TV in the same neat and cosy but simply decorated room. But like every ambulance station the world over, all the clinical personnel remain poised to dash to their ambulance the moment a call is taken.

Recognising that Isaac was slightly too young to either go out on-vehicle or stay on his own at the hotel the charming young females in the team quickly took him under their collective wing, inviting him to play cards and making sure that he had a sleeping bag and a pillow ready for when he decided to get his head down for the night.

The wide age range of the team was immediately noticeable, as was the fact that the youngest members were not necessarily the most inexperienced. For example, Gabriel Chapaca, just 20, had qualified as a full paramedic at just 19, while Stalin Landazuri, 44, was a full-time teacher and a psychology counsellor who has been volunteering 1-2 days per week with Cruz Roja for over a decade. Married to Veronica and with 4 daughters, Stalin is trained to the level of Advanced Search & Rescue skills and happily joked to me that as the sole male in a noisy household of women he looked forward to his night-time voluntary work as a means of getting some "peace and quiet". Pleasingly though the gender balance for the shift favoured females, with both dispatchers, Gabriella Franco (24) and Fanny Angelita Inlago (22) and five of the clinicians being women – Vanessa Pallo (21), Denise Vielardo (23), Carolina Jacho (24), Ivonne Quinones (25) and Belen Candela (27). Between them they ranged from 'Assistants', students in the first couple of semesters, up to 'Advanced', those such as Belen and Denise who were nearing the end of their course and were due to qualify as registered paramedics.

Leading the team for the night was our friend and escort, Ivan, whose job it was to introduce us to the crew. As Isaac and I were already learning, the two features which distinguished staff, trainees and volunteers across ISTCRE and the wider Cruz Roja family were their boundless good cheer and their amazing enthusiasm for saving lives and improving their life-saving medical skills. Freddy Baque, a 30-year-old fully-qualified paramedic with the Rescue team explained that he'd begun his relationship with Cruz Roja as a 15-year-old volunteer and was proud to be among the first cohorts of fully-qualified paramedics trained by ISTCRE during its start-up period.

The other senior member for the shift was Edwin Davila, an ISTCRE training professor and also a coordinator with CREMYAP. It struck me as impressive that a course instructor was working on shift with his pupils. While waiting for the

first call of the night Edwin explained the pattern of responses dealt with from the station. As always weekends were busiest but, overall, the surprising thing was how relatively few calls came in.

Six to eight calls on a night shift were considered busy. When I explained to him that UK city-centre crews might handle over 30 calls during a 12 hour shift he was taken aback but explained that since the local population was still not used to having a free ambulance service they rung it only when they considered they had a genuine emergency. Oh, for such courtesy! Some of the calls were referrals from the police after, for example, an RTC. Before ISTCRE introduced their service only 4% of patients arrived at hospital by ambulance and these would be wealthier citizens signed up to a private ambulance service. Now 68% of all patients arriving at the ED were transported by Cruz Roja. The goal, he explained, was that within five years, 90% of all patients would be transported by Cruz Roja. In terms of numbers last year Cruz Roja responded to 5480 patients, of which only 80% were transported to Quito's eight public hospitals and 20 clinics after examination. The prediction for 2019 is that they will respond to 8,000 calls – an increase in call volume of 32%. The big question, he pointed out, is: where will the additional funding come from?

And in terms of those families fortunate enough to subscribe to a private ambulance service what was the average unit cost per transport, I inquired? Around $20 US dollars. Now, while this may seem cheap to a North American or European person, to put this into context, this is a city where a cab will take you across its entire centre in rush-hour for just $2 US dollars and the average weekly wage for unskilled workers is only about $50.

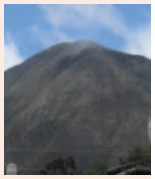
Last but not least in the team was Daniel Robalino (22) who had qualified as a paramedic the previous year and who was one of two drivers for the night. As I found out later, Daniel was the most skilled ambulance driver I've ever spent a shift with. As predicted by Edwin the night was indeed typical.

After a couple of hours' much-needed rest in the dark dormitory on a very comfortable bed we were roused by Gabriella for our first call. Driven by Daniel, with Ivan acting as lead and Vanessa on-board we were called to an elderly female (80) with hypertension and high blood pressure who'd been seen earlier that day by her doctor. After a careful examination by Ivan, which included testing blood pressure, heart rate, blood oxygen levels and pupil reaction, it was determined that her condition was caused by a recent change in medication and that she was in no immediate danger. The patient wasn't transported. Had she been in Copenhagen, Amsterdam or London she undoubtedly would have been – if only to ensure that the crew were adhering to standard European protocols, which I sometimes feel are designed to avoid blame for the ambulance service, rather than considering the patient's comfort and best interests. But as Vanessa explained to me, recognising how scant their actual paramedic and vehicle resources are, ISTCRE-trained paramedics, many of whom have volunteered with Cruz Roja since early adulthood, are taught to both respect the patient's needs but to also bear in mind that the next call may be more urgent and, if possible, the ambulance and crew should be free to respond.

The next call came in soon after our return to base. By now it was past 01.00 hrs. The only information we had was that the patient was a young male possibly suffering a drug overdose. As we rushed to the vehicle Ivan gave me the option of staying on-station, explaining that the neighbourhood they were heading to, La Volta ('the Boot' – so called because of its shape) was considered highly dangerous by both ambulance and police. It was not uncommon he said for gangs to either approach the vehicle and intimidate the crew or, worse yet in his opinion, to wait until they were inside the patient's home treating them and steal vital medical equipment from the vehicle. Explaining that I was content to take responsibility for my own safety, I joined them anyway, and it was during the high-speed 25 minute drive through dense fog along narrow, poorly-paved and cracked roads up steep mountain paths with sharp curves that I realized that Daniel had far from ordinary driving skills. This baby-faced paramedic could, I considered, give Lewis Hamilton a run for his money. Though I doubt that Mr Hamilton would have been capable of getting the

Ecuador – Some Key Facts

1. Officially known as: 'The Republic of Ecuador'
2. Motto:
   "Dios, patria y libertad" (Spanish)
   "Pro Deo, Patria et Libertate" (Latin)
   "God, homeland and freedom" (English)
3. Population: 16,400,000
4. GDP: $110B
5. Currency: US Dollar
6. Capital City: Quito
7. Largest city: Guayaquil
8. Area: 283,561[5] km2



9. Climate: Mild all year round – divided into 'rainy' and 'dry' seasons. Because it's on the Equator there's little variation in daylight hours with sunrise at 6.am and sunset at 6pm throughout the year.
10. Special geographical features:
    i) On the Equatorial line
    ii) Cotopaxi – just south of Quito is one of the world's highest active volcanoes
    iii) Biodiversity – it is the most biodiverse nation on the planet
11. Geography; It has four main geographical regions:-
    i) La Costa – the Coast
    ii) La Sierra – the Highlands
    iii) La Amazonia – also known as 'the East'
    iv) La Region Insular - the region comprising the Galápagos Islands, some 1,000 kilometres (620 M west of the mainland in the Pacific Ocean).

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ambulance safely to its destination so quickly. The home of the patient was in one of the poorest neighbourhoods I have ever visited. Consisting of a couple of thousand homes in various states of decay, many boarded-up but still occupied, and most on roads scattered with refuse and with pot-holes the size of buses, they were poorly-lit, if lit at all and there was something else that jarred. Eventually I realized what it was. "Why are there no shops… no shops at all?" I asked Ivan. He looked at me ruefully and explained: "Sadly, they just don't work around here. Some have tried to open small grocery stores but they are looted and robbed within hours… often with violence. So as a business model it just doesn't work."

When we arrived at the house on a steep narrow road overlooking scrubland, I asked Ivan how Daniel had found it. The area was so dangerous and remote that it literally couldn't be found via Sat-Nav and the small road didn't even have a name. "Simple", he replied. "We develop our own local knowledge because we need to." We entered the home to find the concerned family (a mother, a brother, an aunty and a grand-mother) waiting anxiously in the kitchen. With the walls crowded with the Catholic paraphernalia that I had noticed was the norm everywhere in Quito – shops, offices, homes, even street-side kiosks – the first thing that struck me was how immaculately clean and cosy this home was. After a brief discussion with the brother it was established that the patient, his 20 year old brother, had spent the evening in an unofficial bar, probably a neighbour's living room, smoking cannabis and drinking a concoction popular among the local youth – a fruit drink purposefully spiked with methylene. Why, I asked Daniel,

was this a popular drink? His reply made sense: "There aren't that many bars or liquor stores so young people find their own alternatives. Plus this drink gets you really high… But it is dangerous, very easy to overdose on!"

When we entered the small, cramped bedroom, two mattresses were on the floor pushed together and the young patient was lying limply on one side with his arms flopping by his side and his eyes closed. Ivan spoke to him gently while encouraging him to do his best to sit up. After careful questioning to establish the night's events and a very thorough set of examinations, Vanessa was able to reassure the visibly shaken brother that the patient would be fine. "Keep him awake and give him lots of water" was the simple prescription. The patient wasn't transported. "Not necessary", explained Ivan. "He's not at any real risk and if he deteriorates, which he won't, I've told his brother to call us back immediately. But it's Easter weekend and the hospitals are super-busy and to be honest, they can't offer him anything. He doesn't need his stomach pumping and the toxins will leave his system if he rehydrates."

On the way back to base another strange fact struck me. Unlike all other ambulance crews I have observed the world over, the Cruz Roja team behaved differently on arrival. In most cities I've visited - from Jerusalem to Las Vegas or from Copenhagen to Quebec– this crew didn't begin by dragging in stretchers, carry chairs, defibs or whatever else was on-board they could lay their hands on into the patient's house on arrival. Ivan explained this to me very simply. "Yes, we've got all the basic kit and equipment. Not the most expensive, I know, but it's all in working order. But the thing is this. Firstly, we know that most of the time we probably won't be transporting the patient; and, secondly, we really feel that the less dramatic we are when we enter the patient's home the less stressful it is for them and their family. If we need the carry chair we can always go back out and get it."

Our final call of the night came in at 4.32 hrs and it was to an even more remote and poor neighbourhood, also in the remote North of the city. During the 15 minute drive I noticed that many of

the more populated arterial routes were already awake – if indeed their residents had even been to bed yet. I saw homeless people with their belongings in shopping carts, groups of middle-aged men sat on stoops smoking and drinking and more than one prostitute openly plying her trade by shabby shop fronts, making her pitch to anyone who would make eye-contact.

This time the patient was a 45 year old man living in a shack on a concrete terrace above the house of a farming family in an oddly rural village-like area, Naxon. It must have been on the very outer Northern border of Quito. The report said the patient had been suffering seizures since the early hours. When Ivan spoke with his wife it emerged that he had long-term mental health problems and had spent the night kneeling by his bed in prayer and reporting that he was in actual conversation with Jesus Christ who had appeared to him to instruct him to embark on a mission to spread the Good Word. It was after this that the seizures began. Again Ivan, Daniel and Vanessa embarked on the most careful and sympathetic diagnosis, asking about his prescribed drug regime, and gently asking if there were any issues with either alcohol or any un-prescribed drugs. The room he and his wife shared was literally a breeze-block shed with a flat roof – the size of a freight container it was undecorated except for rosary beads, a crucifix and a large image of the Virgin Mary. It had bare concrete walls, no carpeting and was crowded with bin-liners overflowing with clothing and knick-knacks. With room only for one rickety bed and a cabinet, this was their home. Toilet facilities and drinking water were shared with a downstairs neighbour and all cooking

and laundry took place on the terrace, regardless of the weather or the time of day. After a long 40 minutes we left and, again, the patient wasn't transported. Ivan explained that the priority, which he'd attended to on the spot, was to speak to the patient's doctor and ensure that later that same day he would be taken to a clinic to meet with a clinical psychologist who could determine the current state of his mental health. Thankfully, he wasn't suicidal and didn't represent a risk to anybody around him. His wife had explained that her husband's mental health problems had begun 9 months earlier when he lost his labourer's job and was, despite strenuous efforts, completely unable to find new work. As time passed, due to lack of money, he spent most of his time isolated at home, praying for work. Earlier that day they had found a lift into the centre of Quito to watch the Easter procession. But, as his wife explained, he was bereft that for the first year in many he was forced to watch as an observer since he didn't have the required $20 needed to participate as a concelebrant. This she felt, might have been the final trigger to his collapse. He was, I decided, just a very poor and mentally exhausted man who had perhaps lost all hope and self-esteem. Maybe conjuring up visions of his own special and exclusive conversation with his Lord was the only salvation he felt capable of creating. Despite the kindness shown by Ivan it was impossible to leave without feeling depressed. Sadly, despite their best efforts the Cruz Roja team could offer their patient nothing except compassion and, at least for a short while, a feeling of worth and dignity.

4. Another Parade, a Panel Discussion and an Unexpected Pop Concert:

On Monday morning we went to the Inca Base station, one of ISTCRE's two main campus sites in the heart of the city. This was the beginning of our official research. Expecting an introductory cup of coffee and a series of scheduled meetings around ambulance training, we were overwhelmed on arrival to see that the entire Institute had prepared an elaborate and impressive parade for us to inspect. Javier Sotomayor and Mauricio took us around an enormous courtyard where ambulances, rapid response cars, responder motorbikes and entire platoons of staff were stood in orderly ranks so we could greet them and begin learning about their various roles. Everyone was in smart uniforms and smiling and, sometimes in halting English, delighted to explain about their particular role. We met teams from their specialist motorcycle responder unit, from their driving school and their specialist rescue team as well as numerous students and instructors. This was followed by a guided tour through their classrooms where we saw students at various stages in their paramedic training engaged in everything from basic first aid, to advanced CPR, to advanced trauma management and even rescue at height, in water, and vehicle extrication. In every classroom the atmosphere was concentrated and disciplined, yet overwhelmingly enthusiastic with a clear bond of trust and respect between all students and professors.

Next on the agenda was our first contact with CREMYAP – the prehospital research body affiliated to the training organisation which only last year launched Ecuador's first ever prehospital journal – 'Revista De Investigacion Academica Y Educacion' – an excellent clinical research publication which encompasses both the clinical, psychological and social aspects of national and international ambulance care. One of it's excellent first research papers on Burnout among health-workers is reprinted in English later in this edition.

ISTCRE is a superbly well-organised academic institution – bustling and busy but with teaching staff and students all moving around in a constant blur of happy chatter and camaraderie. Although not notified in advance we found ourselves taken to a main assembly hall with rows of chairs and a stage where I was informed that I was to be a guest panellist on a debate on the future of South American paramedicine comprised of myself and the editorial panel for CREMYAP's already successful journal. The hall was thronged with students at all stages of their six-semester degree and the debate was chaired by then Deputy-Rector, but now Rector, of ISTCRE, Dr Victor Daniel Malquin Fueltata. Also among the panel were Dr Jaime Flores Luna, Dr Eric Enriquez Jimenez, Dr Gustavo Cevallos Parades and Dr Wagner Naranjo Salas. With Mauricio chairing and translating patiently, over 50 minutes we covered a broad and impressive range of issues with me mainly doing my best to offer ad hoc feedback on the current research and thinking on these issues in other parts of the world such as Europe, India, Australasia and Africa. Topics covered included the latest developments on prehospital pain management (which took in an enthusiastic discussion on the introduction of Penthrox from Australia to the UK), the measurement of standard competencies of EMTs and their global variances, advances in simulation training (which focused mainly on the USA and Denmark), the use of technology in dispatch, which covered the role of IAED (the International Academies of Emergency Dispatch) as a disseminator of best practice protocols globally, and the exceptional achievements of Israel's MDA (Magen David Adom) ambulance service who have developed possibly

Editor's Overview of Ambulance Care in Ecuador

the best technology for the control room of any ambulance service in the world – all built in-house! Other topics covered included mental healthcare for paramedics and remote learning. But the most impressive part of the debate was the fact that the panel encouraged the students not only to ask questions but to express their opinions and ideas frankly and confidently – all of which were listened to and responded to in the most respectful manner.

By late morning I was looking forward to a strong cup of Ecuadorian coffee, a sneaky cigarette break and maybe even a sandwich. But no, not yet. As soon as the team of august clinical academics left the podium the tables and chairs were cleared and to our surprise a full band layout was installed, including amps, speakers, drum-kit and microphone stands. The time was 12pm so I assumed the stage was to be used for a student activity of some type. I was wrong and I was right. Isaac and I were now invited to take front row seats among the students and informed that the ISTCRE's own Rock band was about to perform a special concert in our honour. Imagine our surprise when the bass guitarist and co-leader stepped out with a bunch of seven students… only to be revealed as Rector, Javier Sotomayer. There followed a joyous half-hour jamming session which concluded with their signature tune, the Scorpions 'Wind of Change'. And they were good. Really, really good. But we weren't allowed to sit down. Instead a group of cheerful and attractive young students dragged me and Isaac up from our seats and got us dancing. If only BBC's Question Time ended the same way every week I'm sure its ratings would rise astronomically!

Lunch followed and then another very positive editorial meeting with the journal's Board. Every part of the day was exciting and memorable and Isaac and I both came away impressed and uplifted by the special relationship which clearly exists between the ISTCRE's teaching staff and its students.

5. A Bright Future Ahead Thanks to Dedication, Passion and Hard Work:

ISTCRE trains over 2,000 paramedic students a year from its two campuses. As well as providing paramedics for Ecuador it also trains paramedics for around 9 other South and Central American countries, including neighbouring Peru, Colombia, Brazil and Honduras - all under the auspices of Cruz Roja. Its passionate commitment to improving evidence-based clinical education across South America is undoubted since, as well as establishing CREMYAP and its own already highly-respected clinical research journal, it's next ambitious project is to establish South America's first paramedic university – a project which is enthusiastically supported by Cruz Roja Ecuatoriana and the wider global Red Cross community.

While in Quito I gained a crucial insight into the amazing and dedicated work that Cruz Roja Ecuatoriana is doing to care for the people of Ecuador and also for many of its neighbouring countries. Not only does it provide ambulance care but it also responds to natural disasters, rescuing victims and treating entire communities who have been displaced - most recently after the 2016 earthquake which devastated the country. It also offers support to migrants entering Ecuador from neighbouring countries, and, as we reported on in our last edition, one of the most vital things it does in this area is reuniting families who have lost contact with each other. On top of this it trains Ecuador's military in medical and general healthcare so they can respond better to disasters and also provide a better level of support to the population day-to-day. It also plays a vital role in healthcare education and, at a time when AIDS and HIV are on the rise across South America, simply teaching people about the risks and how to avoid harm is a vital but very challenging undertaking. Add onto this the work it does inoculating children and providing a working blood transfusion service nationally and you begin to get an understanding of what a vital role the National Red Cross in Ecuador plays in the life and well-being of its all-too often hard-pressed population.

But the beating heart of Cruz Roja Ecuatoriana is most certainly ISTCRE and CREMYAP. They are the ones that are not only providing free ambulance care across this very proud nation but also bringing hope for the future by training

more and more paramedics and doing more and more prehospital research so that the overall quality of ambulance care continues to rise.

Since our visit the charismatic and inspirational founder of ISTCRE and CREMYAP, Javier Sotomayor, has departed from his role of Rector.

However, his former deputy, Dr Victor Daniel Malquin Fueltata has taken up the role of Rector and, as well as ensuring much-needed stability to both organisations, he is determined to use his own impressive medical knowledge and leadership skills to carry on the blazing flame of innovation and improvement that his friend and predecessor lit for Ecuador back in 2004. Their next project is to form a much-needed university of paramedic science. I have every confidence they'll deliver on this as well. So, in closing, I urge as many of *Ambulance Today*'s friends in the global ambulance family to please make contact with ISTCRE and CREMYAP and offer them any support that you possibly can.

To find out more about the work of ISTCRE and CREMYAP, email: info@cruzrojainstituto.edu.ec (ISTRCE) or cremyap@cruzrojainstituto.edu.ec

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The history, evolution and mission of ISTCRE

By Víctor Malquín Fueltala.
Rector. Ecuadorian Red Cross Technological High Institute.
Editorial Director. Journal of Academic Research and Education- ISTCRE.

The origin of the Higher Technological Institute of the Central Ecuadorian Red Cross (ISTCRE), is based on the values of the International Red Cross and Red Crescent Movement. Its global work strategy is focused on improving the lives of the vulnerable people it supports and on assisting the activities of the National Societies and their programs focused on the prevention and intervention of disasters, the improvement of community health and the dissemination of the values and principles of the movement.

The Ecuadorian Red Cross is an active part of this movement, and is part of its second National Development Plan. Thanks to the efforts of authorities, students, parents, relief institutions, the CONESUP and the community in general, the Higher Technological Institute of the Central Ecuadorian Red Cross was created and, as such, is part of the National System of Higher Education. ISTCRE offers its student community the opportunity of professionalizing the care of Pre-hospital Emergencies, Risk Management, Planning processes in self-protection, and linking to the economically active population through unprecedented technological careers in Ecuador . ISTCRE also has a highly-focused Social Mission.

Since the National Council of Higher Education authorized the operation of

the Institute, the Ecuadorian Red Cross has also contributed to the community; improving the quality of life through the care of Pre-hospital Emergencies with crews and technical personnel trained daily in the rigor of a Constructivist - Participatory stream, where the focus is humanity and the principle priority is solidarity.

Being a paramedic is a worthwhile profession in any part of the world; it provides a concrete profession including life experiences for any young graduates. With a high level of professionalism in planning and University Teaching, our specialists have been able to integrate the objectives of the International Movement of the Ecuadorian Red Cross, the Law of Higher Education and the Regulation of Technical and Technological Institutes, through an updated curriculum planning the latest technological advances, and above all, an educational system of tutoring and practices unprecedented in the country. Addressing the great disasters and daily emergencies in the country since 1922 gives us the authority to do so, based on our National and World experience.

Why We Exist:

"Training, educating, self-protecting and planning possible contingencies allows raising the degree of resilience and minimizing the negative effects of adverse events."

Ecuador ranks seventh in vulnerability according to the UNDP. It is prone to suffering the effects of earthquakes, volcanic eruptions, landslides, earthquakes, and mudslides, among other factors, so it must have university professionals to administer the prevention, mitigation and recovery of the effects of disasters, threats and risks as well as seeking to reduce vulnerability; through this we can improve the resilience of communities, state institutions, private companies and the public in general.

It is one of the purposes of the Red Cross, that in the shortest time possible,

all ambulances and Relief Institutions, Private Clinics and State Hospitals of the country are equipped, qualified and managed with University Pre-hospital Professionals and Risk Managers that represent the professional link between the first link of the Distress Chain that is the community and the third link that are the terminal care centers, such as hospitals and clinics.

We firmly believe that any investment in preparation and training will always yield better proactive results than a reactive response. Therefore, ISTCRE is dedicated to training students at all levels, state officials, private services, and members of the public in short-term extracurricular courses, with the aim of raising awareness in the community of the importance of expanding our knowledge of how to intervene in an emergency and how to save lives.

How We Were Created:

The Institute as a unit of Higher Education was born in two simple classrooms within the headquarters of the Red Cross at Avenue Gran Colombia and Elizalde corner. It began with just 35 students and only 10 professors; thankfully these outstanding doctors had the political support of the presidency of the Ecuadorian Red Cross. It all began under the direction of our original mentor and project leader, Javier Sotomayor Montero, a graduate engineer. Javier's proposal was an innovative project and its result was the approval and creation of the Higher Technological Institute of the Central

Ecuadorian Red Cross (ISTCRE) which gave the right to train professionals for the country, with the knowledge and the appropriate skills to attend an emergency, prevent risks, attend disasters and save lives.

The mission of the ISTCRE:

The professional that is trained in the ISTCRE classrooms is trained on a constructivist and participative culture, where the focus is on the person - the first principle is solidarity. The most important value held in the creation of the ISTCRE was that it should open its doors to the Ecuadorian community in general.

The ISTCRE is part of the higher education system and, as an Institution of Higher Education (IES), it must comply with the legal guidelines; among the most important of them are: -

Article. 27. - Education will focus on the human being and guarantee its holistic development, within the framework of respect for human rights, the sustainable environment and democracy; it will be participatory, obligatory, intercultural, democratic, inclusive and diverse; it will focus on quality and warmth; it will promote gender equity, justice, solidarity and peace; it will stimulate critical thinking, art and physical culture, individual and community initiative, and the development of skills and abilities to create and work. Training of professors and researchers will guarantee the right of professors and researchers to access training and education; higher education institutions will establish at least 1% of their annual proposals for the fulfillment of this purpose.

Article. 350. - The higher education system will be aimed at academic and professional education with a scientific and humanistic vision; scientific and technological research; innovation, promotion, development and dissemination of knowledge and cultures; and the construction of solutions for the country's problems, in relation to the objectives of the development regime.

Article. 351. - The higher education system will be articulated to the National Education System and the National Development Plan; the law will establish the coordination mechanisms of the higher education system with the Executive Function. This system will be governed by the principles of responsible autonomy, co-government, equality of opportunities, quality, relevance, integrality and self-determination for the production of thought and knowledge, within the framework of the dialogue of knowledge, universal thought and global scientific and technological production.

Results:

All processes must be constantly strengthened and their results assessed through the mandate of higher education. The institution is therefore part of an accreditation and evaluation process. As a result the institute was among the best in the 'A' category, according to the National Council of Evaluation and Accreditation of Higher Education of Ecuador, CONEA in 2010. Its success is even greater, if one considers that in the evaluation carried out there were institutions with more experience in the field of higher education in the country.

Its constant process of advancement, updating and growth allowed the new evaluation carried out by the Council for the Evaluation, Accreditation and Quality Assurance of Higher Education, CEAACES, to confirm that the Institution was once again in the highest category: it qualified it as accredited, and it was ranked among the top five

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best technological higher education institutions in the country, in a total of 219 institutions that participated in this process. Today ISTCRE advances its actions with the participation of more than 2100 students, a school of Medical Emergencies dedicated to the attention of emergencies, a school of Management focusing on Risk and Disasters and a recently created school of Professional Conduction that grants license Type C1.

Future:
Higher education is closely linked with the advancement of communities and with solving the local needs, and our training reflects this. The principles proclaimed in the Cordoba Reformation of 1918 are the same as we are now proclaiming; excellence, university autonomy, access to the chairs by contest, academic freedom, massive and free access to studies, linking teaching and research, insertion into society, and Latin American and international solidarity.

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Burnout: A silent threat in the prehospital care service

The workforce in the prehospital care service constantly faces emergency situations and high-risk human decisions. They are usually exposed to what we call 'Burnout Syndrome'. Through this review we present the background, definition and the main factors of occupational and social risk to develop this syndrome, common in personnel that work in the emergency system. In addition, the universally available diagnostic method for this syndrome will be discussed. Finally, intervention measures will be shown for its prevention.

Ambulance staff participate daily in activities that predispose them to physical and psychological stress. They have the responsibility to assess and manage victims of traumatic accidents, and often in a short time must perform actions that potentially increase the chances of patient survival. Due to this constant participation in life or death situations, they are exposed to Burnout Syndrome [1].

Burnout is a psychological syndrome that involves long-term emotional exhaustion, occupational stress and depersonalization in relationships [1,2]. It has an important influence on both work and social life. Firstly, it negatively affects the physical and psychological health of the individual, becoming a determining factor in the development of family problems, drug abuse, alcohol, insomnia and fatigue. Secondly, Burnout decreases labor productivity, satisfaction and commitment at work, and increases absenteeism and low professional morale [3].

Therefore, the objective of this article is to identify the risk factors and main characteristics of Burnout Syndrome in prehospital care staff, as well as the preventive measures thereof.

Background

The term 'Burnout' began to be used regularly in the United States in the mid-1970s, to refer to a psychological syndrome present in response to interpersonal stressors at work. Initially, the personnel working in human resources and health care were investigated; these first articles written by Freudenberger (1975) and Maslach (1976) revealed the bases of this condition that include emotional exhaustion, loss of motivation and commitment at work [2].

The interest in this syndrome has been widely studied in health personnel, however, in recent years this field has been extended to personnel working in ambulances [4]. In addition, it has focused on the identification of probable factors that could be related to the presentation of this syndrome such as job satisfaction, gender, marital status, level of education or exposure to violence that could prevent or favour its manifestation [2,3,5].

Definition

Burnout Syndrome is a prolonged response to chronic stressors related to work and is manifested in the failure of the individual's coping strategies [3,6].

In this syndrome we find three dimensions: emotional exhaustion, depersonalization and lack of personal fulfillment at work.

Emotional Exhaustion

Emotional exhaustion is the central feature of Burnout and the most obvious manifestation in this syndrome. It includes emotional, mental and physical fatigue that leads to feelings of helplessness [2,6].

Depersonalization

The individual can put distance between themselves and the patients receiving the service. They can develop an indifferent or cynical attitude in the workplace [2,6].

Personal Fulfillment at Work

Due to the overwhelming and chronic labor demands which contribute

to fatigue and depersonalization, the individual feels dissatisfied with his professional performance which destroys his sense of work effectiveness[2,6].

Clinical Manifestations

The symptoms in this syndrome are varied and complex, as they compromise both the psychological and physical [3].

Some of the symptoms frequently observed are:

- Physical symptoms such as fatigue, frequent headaches, gastrointestinal disorders, insomnia, changes in eating habits, frequent infections and cardiovascular disorders.
- Psychological feelings of guilt, negativism, lack of motivation, mood swings, irritability and little empathy.
- Alteration of behavior such as frequent absences or being late to work, refusing dialogue, avoiding telephone contact, postponing meetings and experiencing conflicting relationships with their family and friends [5].

Prevalence

The incidence of Burnout Syndrome in different health professionals varies from 4% to 14.9% in America as shown in figure 1 [4].

In this cross-sectional study, 11,530 Spanish-speaking health professionals residing in Spain and Latin America were included from December 2006 to September 2007. The participants answered the online questionnaire through the Internet portal "Intramed".

Country	Prevalence of Burnout
Argentina	14.4
Mexico	4.2
Ecuador	4
Peru	4.3
Colombia	5.9
Uruguay	7.9
Guatemala	4.5
Spain	14.9
El Salvador	2.5
Others	9

It is important to note that this is the largest study that has been done so far in Spanish speaking countries, where the health professionals included were doctors, nurses, dentists, psychologists, nutritionists, biochemists, and pharmacists, but it did not include paramedics or technologists in medical emergencies. Therefore, these results should be interpreted with caution when correlating them with prehospital care [4].

The first national study in the United States was recently conducted to determine the prevalence of Burnout in medical emergency personnel, revealing a rate of 38.3% in paramedics and 24.9% in technologists in medical emergencies. Interestingly, this study also indicated that emergency medical professionals who experience Burnout are twice as likely to report a high level of absenteeism due to illness at work (7). It indicated that 88.9% showed emotional exhaustion, 97.4% lack of personal fulfillment at work and 100% had high levels of depersonalization [8].

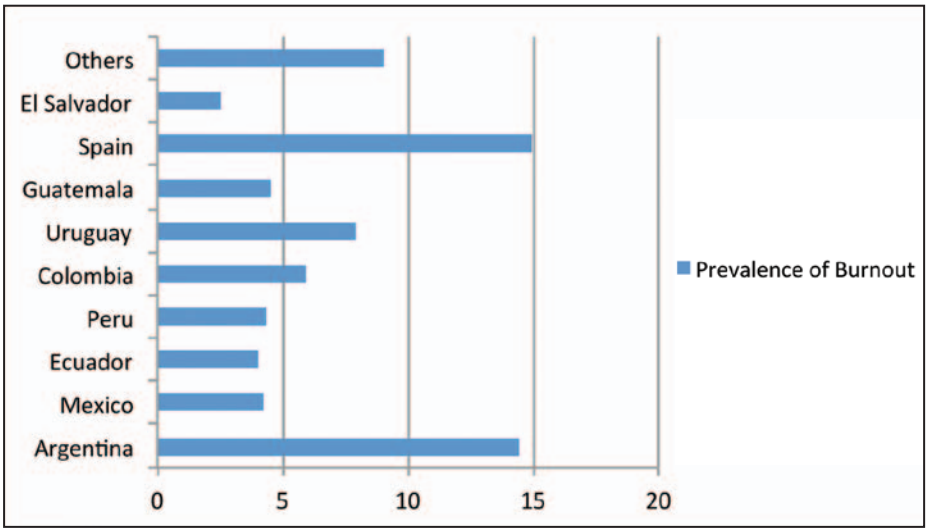
In Ecuador, to the best of our knowledge we do not have a global study of the prevalence of this condition in the prehospital care service.

Risk Factors

The development of Burnout Syndrome is preceded by factors associated with work, personal, social, and environmental elements. It is imperative to identify predictors that could suggest the development of this syndrome. It is important to emphasize that these factors alone are not triggers of this phenomenon but they are facilitators of it [8].

Age

Young professionals (<30-years-old) have a higher risk of developing Burnout Syndrome. This association could be due to the lack of self-confidence or inadequate basic knowledge that contribute as stressors in the decision-making process [2,8].



Civil Status

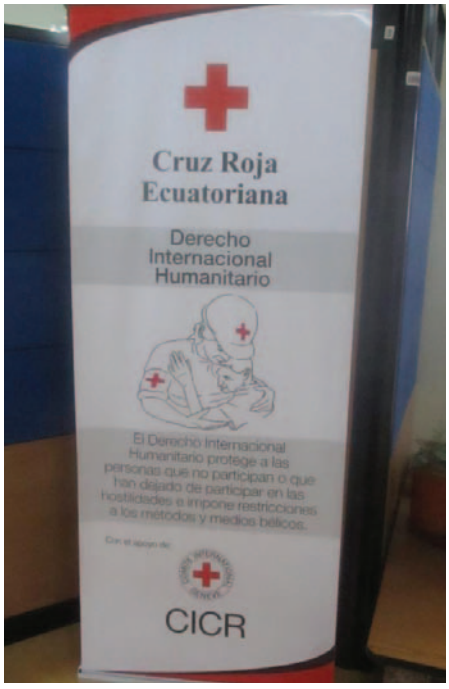
Singles seem to be more prone to Burnout than those who are married or divorced (especially men). Marriage could be a protective factor [2,9].

Gender

There are no conclusive data on the influence of gender on this syndrome. There is evidence that women have higher levels of Burnout than men, presumably because they are more emotionally involved in their work, tend to be softer with their patients and more subjective [5]. However, in other studies this prevalence of Burnout in women has not been corroborated[3], arguing that women share their experiences verbally and perform activities that give them a sense of relief more than men. In this way they recover quickly from trauma situations that could result in Burnout [10].

Level of Education

Some studies have found that individuals with a higher educational level have higher levels of Burnout in relation to those with fewer years of education, inferring that those with a higher educational level have jobs with greater responsibility and high stress. It is also likely that individuals with a high educational level have higher expectations of their jobs and therefore more stress if their expectations are not realized [2].



On the other hand, other studies report that a high level of education does not have a greater influence on Burnout development, since highly educated people would have greater scope for decision making within their work, which makes them less susceptible to exhaustion [9].

Expectation at work

Whether these expectations are idealistic or not, high expectations lead people to work very hard and perform many activities. In this way they reach exhaustion and eventually depersonalization when their hard work does not lead them to obtain the expected results [2].

Workload

García-Izquierdo and Ríos-Rísquez (2012) found that an excessive workload was related to greater emotional exhaustion and depersonalization [11]. Remarkably, Franca et al. (2012), found a higher prevalence of emotional exhaustion in those who worked less than 40 hours [8].

Training

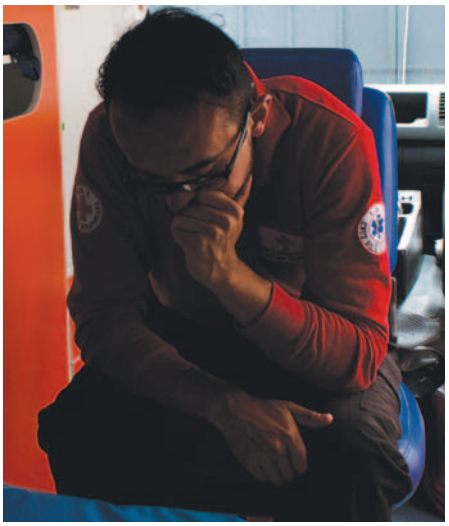
Individuals receiving regular training presented lower levels of Burnout, corroborating that the lack of regular training plus the high levels of stress to which the health personnel are subjected make it difficult to act with efficiency and agility in the face of the victims of trauma or clinical emergencies [8,12].

Wage

Wage is considered a significant factor to professionals presenting Burnout within the so-called effort-reward model [9].

Exposition to Traumatic Events

Occupational exposure to traumatic events such as severe injuries, death, suicide, aggression and suffering have been related to the development of Post-Traumatic Stress Syndrome and Burnout [13,14]. In addition, a positive correlation has been reported between the frequency of confrontation with death and suffering, and emotional exhaustion [15]. Deniz et al., 2016 found that ambulance personnel (ambulance attendants and paramedics) exposed to physical and/or verbal violence had higher levels of Burnout [3].



Excessive Workload

Excessive workload has been widely associated as a predictor of Burnout, specifically influencing the emotional exhaustion that is the centre of this psychological picture [11,16].

Diagnosis

In the 1980s, the Maslach MBI questionnaire (Maslach Burnout Inventory) was developed, as an instrument to measure Burnout Syndrome; until today the method continues to be the most used diagnostic tool [2]. It has been translated to Spanish by Doctor José Carlos Mingote Adán from Complutense University of Madrid, Spain [17].

The MBI is a questionnaire of 22 questions that evaluates three dimensions: emotional exhaustion (nine items), depersonalization (five items) and personal achievement (eight items) [1,18].

For responses to the questionnaire, a Likert scale was used to evaluate the degree of agreement and disagreement with the questions asked. A Likert scale with values between 0-6 is used. Scores of 0 suppose that what is asked never happens and 6 always takes place, leaving the rest of the values at intermediate presentation frequencies between these two extremes. Scores were calculated separately for each dimension [2].

The diagnosis of the syndrome is obtained by high levels in the scale of emotional exhaustion and depersonalization and low levels in the sense of accomplishment in the work [8].

Prevention

An active coping of work stress has been shown to have an inverse effect on depersonalization and lack of personal achievement [15].

Social support decreases vulnerability to emotional exhaustion and depersonalization. Since the staff can express their feelings and obtain emotional and instrumental support in situations of stress, it also provides security, a feeling of belonging and affection in the individual [11,15,19].

The level of job satisfaction is an important indicator of an emerging Burnout Syndrome. The higher this is, the less likely it is that the individual will become a victim of this syndrome[5].

An adequate communication and collaboration with other professionals avoids the feeling of emotional fatigue and depersonalization. For example, O'Mahony found that incorrect nurse/physician communication predisposes to Burnout [20].

Conclusion

Burnout Syndrome is a condition characterized by an extreme physical and emotional fatigue that is attributed to a specific area of work life. In this disorder, the complex influence of multiple organizational and personal factors can lead paramedical personnel to display a behavior within their work activity which is influenced by emotional exhaustion, depersonalization and where lack of performance in their work is evident.

Unfortunately, the global prevalence of Burnout Syndrome in prehospital care personnel is unknown in our country at the moment. In view of the lack of information, we propose the execution of a cross-sectional, descriptive study that will uncover the prevalence of this pathology that silently stalks our technicians in medical emergencies.

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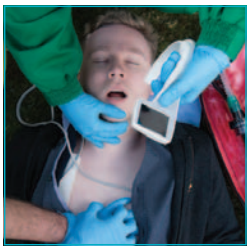

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Quito: The city of height

Quito is located at 9,350 feet above sea level and is a high altitude city which is visited by people not acclimatized to or familiar with high altitude. Visitors come to perform a range of activities and use many transportation means; these visitors become very exposed to hypoxia due to low atmospheric pressure and, as such, they can present symptoms of deep high mountain illness and can present level 1 clinical manifestations up to death. The specific treatment for this hypobaric hypoxia is P oxygen administration. Prehospital personnel must know clinic manifestations of deep high mountain illness in people that come up to this altitude or higher in order to offer the specific treatment to both prevent and reverse hypoxia effects.

In Quito the atmosphere is constituted of air that is a mixture of: 78% nitrogen, 21% oxygen and the remaining 1% of other gases (argon, neon, carbon dioxide, etc.). This is known as Atmospheric Pressure, ie: that pressure exerted by the air at any point of the Earth's atmosphere, varying this pressure according to height. The partial pressure of oxygen decreases directly and is proportional to the atmospheric pressure. The partial pressure of oxygen promotes its diffusion at alveolar level, so that the ascent to a height (high, very high or extreme level) reduces the uptake and supply of oxygen to tissues in people not acclimatized and sensitive to height. (Justification: In Quito, at 2850 masl, the atmospheric pressure is 540 mmHg which equals 0.71 atmospheres, so that people who ascend to this height can suffer the effects of hypobaric hypoxia as well as people who ascend for tourism or sports to the Pichincha volcano). We must recognize hypobaric hypoxia and its effects on people who ascend to an altitude: high, very high and extreme, through their clinical manifestations, in order to provide them with care and adequate prehospital treatment.

The Earth's atmosphere is constituted of air, which reaches a calculated height of about 400 kilometers from the surface of the earth; the air is retained by the effect of gravity thus this cannot escape into space [(2)]. The mixture of air gases contains a group of gaseous molecules in almost constant concentrations and a group with concentrations that are variable in both space and time; thus there are areas contaminated with high emissions of carbon dioxide (CO2), therefore, its percentage in the air increases. But if we speak of pure air, that is to say, air which has not been affected by the contamination of man and at sea level, its composition is: 78% Nitrogen, 20.9% Oxygen, 0.90% Argon, 0.03% Carbon Dioxide and the rest, approximately 0.17% other gases, such as Helium, Hydrogen, Xenon, Nitrous Oxide, Ozone, Ammonia, etc.; this percentage is in volume. The pure air is humid because it contains water vapor in a variable proportion that never exceeds 1% of the total gas. The air, as with all matter, is a gaseous mass that occupies a space has a specific volume and exerts a pressure and unlike solids, can be compressed. The air has an approximate density of 1, 293 grams / liter. This is responsible for the atmospheric pressure proportionally, thus, when varying the density, it increases the weight of the air or decreases it's proportionality. Atmospheric pressure therefore is the force per unit area exerted by air on the earth's surface.

"The atmospheric pressure, that is the weight of the air above our heads, depends on the height, ie: being higher the closer to the sea level we are. *This is due to the fact that atmospheric pressure depends on the weight of the air that is left above. As we go higher, less air is left above our heads, which therefore weighs less and exerts less pressure. In addition, as the air is less dense as we ascend in the atmosphere, this makes its weight decrease even more*"[(2)]. The humidity of the air varies according to its temperature, the latter decreases 6.5ºC for each kilometer of height, in relation to the exerted pressure of 760 mmHg at 0ºC at sea level and in standard gravity. Oxygen (O_2), is a colorless, odorless and tasteless gas molecule, which constitutes up to 21% of the air. It is very reactive and activates combustion

processes for the generation of vital energy, becoming the key gas, which is essential for the effective maintenance of life in human beings through the process of respiration[6].

In height, the composition of air remains the same, but the total barometric pressure decreases with increasing altitude, therefore, the partial pressure of O_2 (PO_2) decreases and is directly proportional to atmospheric pressure. In relation to the volume of the air according to the Law of Boyle (Law of the gases), this is inversely proportional to the pressure, thus; at lower pressure greater volume [8]. In technical terms of prehospital care, height is defined as a higher elevation, 1,500 msnm (4,920 feet) and it is divided into 4 specific groups [12]:

a. Intermediate height (1,500 - 2,500 meters above sea level)

b. High altitude (2,500 - 3,500 meters above sea level)

c. Very high height (3,500 - 5,800 meters above sea level)

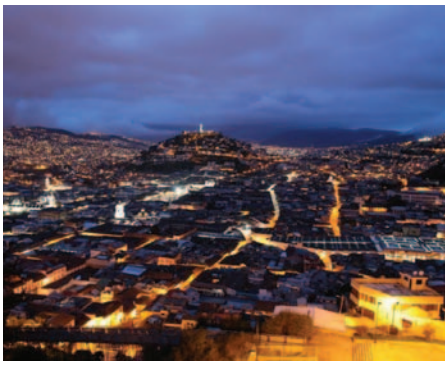
d. Extreme height (> 5,800 meters above sea level)

The maximum height in Ecuador is recorded in the Chimborazo volcano as being 6,268 meters above sea level, in the province of Pichincha, the Rucu Pichincha volcano of 4,698 masl and the Guagua Pichincha of 4,784 masl. Quito the capital of the country is at 2,850 meters above sea level (Province of Pichincha), this Metropolitan District extends along the eastern slopes of these last two volcanoes and, according to the height classification described above, is considered to be within high altitude cities, as well as the city of Riobamba at 2,764 masl (Chimborazo province), Latacunga at 2,750 masl (province of Cotopaxi), Cuenca at 2,560 masl (province of Azuay), Ambato at 2,500 masl (province of Tungurahua). The partial pressure of the O_2 promotes its diffusion at the alveolar level, so that the ascent to a high height reduces the uptake and supply of O_2 to the tissues. At sea level, the atmospheric pressure is 760 mmHg, equivalent to 1 atm, at the level of Quito, which is 2850 meters above sea level; its atmospheric pressure is 540 mmHg, which equals 0.71 atm. By the reduction of atmospheric oxygen due to the decreased pressure of the same, people who ascend to this height and have clinical manifestations of acute mountain sickness, have been affected by hypobaric hypoxia, also called hypoxic hypoxia. The anatomy of the airway is divided into superior and inferior, each one playing an important role in ensuring the exchange of gases; a process by which the oxygen of the environment enters the organism and the CO_2 of the organism leaves the environment [3,4]. During the process of breathing, inspiration is the active phase, by which the components of atmospheric air (environment), enter the organism through the upper airway then the lower airway to reach the alveoli, actively using the respiratory muscle system, the main one being the diaphragm muscle; all the muscles used in breathing are stimulated and regulated by the central nervous system. The activities of these respiratory muscles are responsible for generating negative pressure inside the thoracic cavity. This in turn causes atmospheric air to enter the alveolus [4].

The oxygen present in the alveolus is mobilized through the alveolar capillary membrane and binds to the hemoglobin that is the main constituent of the erythrocytes. As part of the circulatory system these are transported to the tissues and cells of the whole body, being the fuel substrate for aerobic metabolism and its production of cellular energy as the main product to maintain the functions of life. A byproduct of this metabolism is the CO_2 that diffuses into the blood and when passing through the pulmonary capillaries is released to the alveoli and to the ambient air [4,9].

The partial pressure of oxygen (PO_2) in the alveolar air is what drives its diffusion to the peri-alveolar capillary blood where it will join in a chemical combination to the hemoglobin- that is, the amount of oxygen combined with the hemoglobin depends on the PO_2, paraserted towards the tissues; this requires that the alveoli must be filled permanently with a reserve of fresh air that contains the adequate amount of oxygen that is required, a process known as ventilation. In turn, this same process is essential to eliminate CO_2, in a ratio of 20 to 1. This means that for each molecule of oxygen that passes to the pulmonary capillary blood, 20 molecules of CO_2 pass into the alveolar air [3]. Under ideal circumstances and at sea level, when ventilation and pulmonary blood flow coincide, the alveolar PO_2 is 110 mmHg (158 mmHg ambient air), due to its dilution with CO_2 of 40 mmHg and water vapor of 47 mmHg. Normally the alveolar gas and capillary blood are balanced. However, people who migrate at a higher altitude than usual, reduce the uptake and supply of oxygen to tissues by low atmospheric pressure [5].

It is important to understand the effects of the altitude and the low pressures of the gases on the human body, as well as the city of Quito that is at 2,850 meters above sea level, on the slopes of the Pichincha volcano and is therefore considered a city of height. It becomes a risk for people who migrate to this city, temporarily or permanently[1]. These may be residents of the low altitude areas (coastal region and eastern region) who for any reason, such as social, cultural, tourist, commercial, etc., have to ascend to this height; as well as the people who migrated from this height towards areas of low altitude and then have to return after a while: It also applies to natives of this city and to tourists who for sport reasons have to ascend towards the high part or summits of the mountains. We could also mention that in the city of Quito, there are human settlements in the high places of the hillside of the volcano, due to urban expansion that has occurred in the surrounding protective forests of the western side, reaching even the moor of the mountain. These places are not so suitable for permanent habitation. As we have seen, in the height of the city of Quito, the uptake and supply of oxygen to body tissues is reduced by low atmospheric pressure (hypobaric hypoxia) in non-native people - not acclimatized and ascending to this height or more. In the case of carbon dioxide (CO_2), the alveolar PCO2 decreases in response to this acute exposure by increasing alveolar ventilation by approximately 5 times, due to the increase in respiration, reaching a pressure of 7 mmHg in the alveolus [1,4]. When the human body is exposed to height, which is the same as a hypoxia condition, due to the decrease in O_2 pressure, physiological mechanisms are set in motion aimed at regulating the fall in blood pressure of oxygen. These regulatory mechanisms are intended to avoid disturbance of the balance of the internal environment, known as the process of acclimatization and the efficiency of these regulatory systems presents variations among individuals. People who ascend to the city of Quito, or to the mountains, present physiological responses to this exposure of acute hypoxic hypoxia; thus increasing the frequency and depth of breathing (by stimulation to the carotid and aortic baroreceptors), it increases heart rate and cardiac output (due to reflex activation of the sympathetic nervous system). There is a decrease in peripheral vascular resistance (by local mechanisms of self-regulation), but the general blood pressure that is measured in the extremities remains the same, unless the hypoxia is prolonged or very pronounced; except for the vasoconstriction that occurs at the pulmonary level, being the cause of pulmonary arterial hypertension in order to match the blood flow with ventilation to optimize the exchange of gases in the lung [3]. At the level of the central nervous system, hypoxia is less tolerated, and with a mild deficiency of oxygen, it already shows a decrease in intellectual capacity with deterioration of lucidity and psychomotor capacity; which if this deficiency increases, may present confusion, restlessness, stupor, coma and death as PO2 falls below 30 to 40 mmHg. It is evident that victims do not usually perceive or notice this progressive shortage of oxygen [13].



Currently, much more is known about the effects of hypoxia on cellular and biochemical changes that are produced by effects of acute exposure to hypoxia- ranging from modification in gene expression, interruption of aerobic metabolism and depletion of intracellular energy stores- causing the latter, the alteration and deterioration of cell function until death, depending on the variables, such as: the metabolic needs according to the type of tissue (cerebral, cardiac, pulmonary, renal, among others), the oxygen deposits that these tissues have and the amount of energy they obtain from their anaerobic capacity (glycolysis less effective[9]; thus, in a person who enters a cardiorespiratory arrest, the survival interval varies from 1 to 2 minutes in the cerebral cortex to about 5 minutes in the heart and 10 minutes in the kidneys and liver, with the possibility of a certain degree of recovery if cardiopulmonary resuscitation restores spontaneous blood flow after these times[15]. Since measurable quantities of terminal products of this metabolism, such as lactic acid, have been released into the circulation, so paradoxically by the ischemia-reperfusion syndrome (resuscitation plus oxygenation), which is the result of the generation of highly reactive oxygen free radicals.

The physiological changes of adaptation in the exposure to a great height during a short lapse of time are: the increase of the number of pulmonary alveoli (recruitment), greater concentration of hemoglobin in the blood and myoglobin in the muscle, as well as a decrease in the respiratory response. These changes may not be seen in people considered sensitive to hypoxia, which during the sudden exposure causes the so-called Acute Mountain Syndrome, characterized by: headache, nausea, dyspnea, sleep disorders and deterioration of lucidity that can progress to pulmonary edema and / or cerebral edema[14,15]. After having briefly analyzed acute exposure to hypobaric / hypoxic hypoxia, the prehospital health professional should treat the victim and know about the physiological effects of oxygen inhalation, which is used both to prevent and reverse effects of hypoxia, so the complementary oxygen must be adjusted scrupulously to ensure adequate arterial saturation.

The administration of oxygen is carried out by inhaling it - thus allowing the maintenance of an FiO_2 adequate to the need of patient, for which it is used in the systems of administration of oxygen of reduced flow and of high flow at the prehospital level.

The systems of reduced flow are: the nasal cannula (mustache), the simple mask and the mask with reservoir. In this system, the inspired gas is a mixture of the oxygen that we administer according to the litres selected in the flowmeter and with the ambient air. Oxygen can be supplied through the nasal cannula between 1 to 6 L / m, under the condition that the upper and lower airways are permeable, with the disadvantage that, if flows of 4, 5 or 6 L / m are used, there is a drying of the nasal mucosa, which makes the patient uncomfortable, and is very intolerable, hence it is common to use it with a flow of 1, 2 or 3 L / m, giving us an FiO_2 of 24 to 28%. The simple mask with the side holes that allow the exhaled air to come out so that the ambient air also enters, under the condition of a greater need for oxygen, both the nose and the mouth, upper airway and lower permeable. It has the disadvantage that most times the mask does not make a seal with the skin of the face; therefore, there is no strict control of oxygen intake. With a flow of 6 to 15 L / m, the FiO_2 can be up to 60%. To this mask we increase an oxygen reservoir from 600 to 1000 ml, with the same flow, the FiO_2 can exceed 85% [13,14]. Among the high-flow systems the most representative device for the supply of oxygen is the Venturi-effect mask that allows the entry of ambient air reliably and in a fixed amount and the oxygen supply that we administer even humidified, remains relatively constant; hence we can operate with a specific oxygen flow to maintain the desirable FiO_2 from 35% to 100% [3]. During the treatment the oxygen must be controlled and adjusted according to the needs of the patient, especially to remit the effects of hypoxia. So we have the monitoring of arterial oxygen saturation by means of transcutaneous pulse oximetry, which measures oxygen saturation from the pulsatile signal. Its application is simple and does not need calibration, except for homologation for height. This device measures the oxygen saturation and not the partial pressure of the oxygen (PO_2), so it is not sensitive to increases in PO_2 that exceed the concentration necessary to completely saturate the blood. The advantage of oximetry is that it can monitor oxygenation during prehospital care procedures and can be regulated in situations that demand the pathology of the patient [3].

Hypobaric Hypoxia

Hypobaric Hypoxia is a phenomenon established as the decline in oxygen supply to tissues due to a drop in the partial pressure of this gas due to exposure to a low pressure atmosphere, as occurs in high areas [12]. The lower atmospheric pressure generates the decrease in the partial pressure of O_2 inspired by the environment; therefore, there is no force necessary for adequate alveolar pressure. This results in a decrease in the amount of oxygen that is transported by the blood to all the cells of the organism (10). Thus, at sea level the hemoglobin is saturated with oxygen in a 95 to 99% and in heights as at 3,800 masl the saturation decreases to 90%, at the level of prehospital care we consider in the city of Quito a normal capillary saturation of 92%.

Acute Exposure to Hypobaric Hypoxia

Migration criteria:

1. National or foreign persons who ascend from a low elevation or sea level to the city of Quito.

2. The native or acclimatized people of the city of Quito who ascend to a very high or extreme elevation (mountaineering).

3. People who have migrated to an area of low elevation or height that have remained for a certain time and have returned to ascend to Quito.

4. The non-acclimatized people who ascend to Quito by fast means such as aviation.

Clinical criteria:

1. Neurological: decreased mental performance, memory and the performance of defined motor movements, dizziness, laxity, headaches, nausea and euphoria. These can lead to cramps and convulsions as you ascend, which can lead to coma or death.

2. Respiratory: Tachypnea, dyspnea, cyanosis, rales, pulmonary rhonchi.

Clasification

Hypobaric hypoxia is found within the inadequate oxygenation of blood in the lungs due to extrinsic causes, this is oxygen deficiency in the atmosphere.

Clinical manifestations:

Subjective:
1. Headache
2. Fatigue
3. Disorientation
4. Confusion
5. Hallucinations
6. Weakness or adynamia
7. Thoracic congestion or tightness
8. Dizziness
9. Nausea

Objective:
1. Vertigo
2. Vomit
3. Anxiety
4. Ataxia
5. Drowsiness
6. Stupor
7. Comma
8. Dyspnea at rest
9. Cough
10. Rattles or rhonchi
11. Tachypnea
12. Central cyanosis

Plans:

Prehospital diagnostic plan:

a. Not critical: soroche or acute mountain sickness

b. Critical: cerebral edema and pulmonary edema

c. Potentially fatal: untreated pulmonary edema and cerebral edema

Differential diagnosis:

a. Pneumonia

b. Asthma

c. Congestive heart failure

d. Migraine and Influenza-like breathing problems

Prehospital treatment plan:

For people with migration criteria to the city of Quito.

General plan:

- Paramedic with biosafety regulations
- Patient safety rules
- Keep the patient at rest
- Primary transport in advanced ambulance type [2]
- Application of institutional rules and transit laws during transportation
- Manual and electronic monitoring of vital signs

Specific plan:

Objective: Reverse hypobaric hypoxia

- Inhalation of oxygen by mustache from 1 to 6 lpm,

Simple mask from 6 to 15 lpm

Mask with reservoir 6 to 15 lpm

- Oxygenation monitoring: oxygen saturator maintains saturation over 90%

For people with mountaineering criteria:

General plan:

- Paramedic with biosafety regulations
- Patient safety rules
- Rescue and descent to a second or third level hospital in the city of Quito
- Avoid hypothermia
- Primary transport in advanced ambulance type 2
- Application of institutional rules and transit laws during transportation
- Manual and electronic monitoring of vital signs

Specific plan:

Objective: reverse hypobaric hypoxia

- Inhalation of oxygen by mustache from 1 to 6 lpm.

Simple mask from 6 to 15 lpm Mask with reservoir 6 to 15 lpm

- Monitoring of oxygenation: oxygen saturator maintains saturation over 90%

Prophylactic useful medication:

- Acetazolamide 125 mg to 250 mg every 12 hours
- Dexamethasone 8 mg distributed in 24 hours [3]

Conclusions

The city of Quito, capital of Ecuador, is located on the equatorial line, on the slopes of the Pichincha volcano, at an altitude of 2,850 meters above sea level, ranking according to classification as a 'City of High Altitude', to which people ascend due to a diversity of activities and by different means of transport. The city also has tourist and commercial attractions - namely the mountains and volcanoes all around, especially the Pichincha volcano that is at a height of 4,784 meters (very high altitude). These people face in acute form at a low atmospheric pressure, therefore an inadequate oxygenation of the blood in the lungs due to the deficiency of oxygen in the atmosphere, and depending on its sensitivity, speed of ascent, permanence at high altitude or more, may present symptoms of the so-called acute malignant mountain that can range from mild clinical manifestations to cause of death. The lower atmospheric pressure in Quito generates the decrease in O_2 partial pressure that is inspired by the environment. Therefore, people not acclimatized experience a decrease in the amount of oxygen that is transported by the blood to all the cells of the organism. This causes the so-called hypobaric hypoxia whose specific treatment is the supplemental administration of oxygen. The typical health professional prehospital carer should know the clinical manifestations of acute mountain sickness in people who are at this height or more, in order to administer specific treatment both preventive and to reverse the effects of hypobaric hypoxia.

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CLARION EVENTS

International EMS standards: Improving patient care worldwide

By Juan Cardona, Aaron Miranda and David Page

In this article, Juan Cardona, Aaron Miranda and David Page, discuss the importance of training and education for first responders. Read below to hear how the Standards of NAEMT's pre-hospital care and EMS systems meet and strive to exceed these Standards.

Introduction:

It's 4:45pm in Bogotá, Colombia. An emergency call comes into the local call processing center. A male in his 40s has a deep laceration to his forearm and is bleeding severely. The local fire department responds by sending a fire truck with three firefighters who are trained at the basic emergency medical responder level. A transport ambulance is also dispatched with two prehospital care providers: a doctor and a driver. The fire department crew is first to arrive and sees the patient's friend attempting to provide care. The friend has loosely tied a t-shirt over the patient's arm. The t-shirt is soaked with bright red blood which is dripping onto the floor. The patient is pale and lethargic to respond. The friend states that they were attempting to lift a large mirror from outside into the second story bathroom when it broke, and a large piece of glass sliced through the patient's forearm.

The officer in the fire engine assesses the injury and realizes the urgency of the situation, as he sees the trail of blood dripping from the patient's arm and pooling next to the patient's feet. He immediately remembers a seminar he attended where an international speaker spoke about the importance of tourniquets and their use for exsanguinating injuries. He reaches into his personal first aid kit, where he finds a tourniquet that he bought at that seminar with his own money. Swiftly, he applies the tourniquet close to the laceration. After tightening the tourniquet, the bleeding stops. At this point, the local ambulance arrives with the doctor, who takes over patient care from the first responders.

The crew prepares the patient for transport to the nearest local hospital. The patient is loaded into the back of the ambulance, but before it departs, the doctor removes the tourniquet. The bleeding immediately resumes, and the doctor scrambles to find a large trauma gauze, which he intends to use to control the bleed. The fire department first responder asks, "Why did you remove the tourniquet?" The doctor references outdated procedures that insist tourniquets are used only as a last resort and that direct pressure, elevation, and pressure points must be tried first. The ambulance leaves as the doctor continues to struggle, attempting to control the patient's severe hemorrhage.

This event, as scary as it may sound, unfortunately occurs quite often in many parts of the world. The disparities found in the way medical providers care for patients can be overwhelming. In some countries around the world, there is a shortage of reputable regulating entities that can evaluate evidence-based research results and issue clear directions to field providers. There is a lack of understanding of medical direction and its role in out-of-hospital care. In addition, legal barriers exist that prevent providers from performing specific lifesaving skills. Regulating entities, medical direction, and standards of care are essential components of a prehospital healthcare system.

Among other things, an effective Emergency Medical Services (EMS) system functions to provide coordinated and timely delivery of health and safety services to victims of sudden illness or injury. Despite the advances in communication and the ease of obtaining information on best EMS delivery models, there are still many countries that have not adopted or established a comprehensive system integrating hospital and prehospital personnel to provide continuity of care. A key factor in the disconnect that exists between hospital and prehospital professionals is the lack of established standards of care for patients who become ill or injured in the out-of-hospital arena. This is further compounded by the lack of interdisciplinary training and education within the healthcare system.

What is a standard?

The International Standards Organization (ISO) defines a standard as: *"...a document, established by a consensus of subject matter experts and approved by a recognized body, that provides guidance on the design, use, or performance of materials, products, processes, services, systems or persons"*. The origin of the word *standard* comes from middle English, denoting an authorized exemplar of a unit of measurement.

In prehospital care, we consider education and care standards as agreed upon expectations that define the quality and achievement of minimally acceptable care. These pre-established guidelines are generally agreed upon by recognized authorities, such as governments, established associations and credible groups of experts.

Guidelines applied by healthcare agencies help facilitate the consistent delivery of state-of-the-art medical care. Ideally, these guidelines should be established from the best available scientific evidence. In the absence of good research, consensus by subject matter experts in their field must be used. In many developed countries, such as Australia, Canada, the United Kingdom, and the United States of America, national prehospital care standards have been developed. These standards define paramedic care and delineate a scope of practice within which EMS providers will function. As much as possible, the delivery of care in these countries has been standardized to reduce mortality and morbidity.

How standards improve patient care:

A standard of care improves patient outcomes by establishing minimally acceptable assessment and treatment norms that will result in the best possible outcomes for sick and injured patients. Once established, these standards help guide the creation of protocols and guidelines that assist prehospital care providers with determining and providing the best care possible. When EMS systems consistently meet or exceed the model standards, patient outcomes and safety should improve. Ideally, these standards are also adopted by other healthcare providers, and a continuity of care can then occur. In order for this to work, it is imperative that all EMS system stakeholders believe in and adopt the standards. It is also important that the standards be based on the most current, evidence-based prehospital care information available.

Verification of competency and meeting standards worldwide:

Verification of competency occurs in different ways, but for this to occur, there must first exist a method for leaders to agree upon and disseminate these standards. Then providers must be able to access, learn, and implement current best-practices. Unfortunately, many providers in developing countries have difficulty accessing the quality of initial and continuing education. Staying up-to-date on the latest research and education can be challenging and costly. This is especially true when prehospital providers must reconcile differing opinions from local experts without access to credible education from recognized sources.

In these cases, following directions from outdated protocols or uninformed leaders cause care and patient outcomes to suffer. In countries in which an EMS system is not yet fully developed, patient care can be inconsistent and outdated. A further challenge is that while providers may be aware of the correct care, their competency in performing the skills and the availability of supplies may be low.

Standards are ineffective unless implemented and verified by means of valid and reliable quality measurements. Both initial verification and continuing verification are essential, including certification through internationally recognized continuing education programs from credible organizations. However, even this can sometimes be problematic; for example, if one program contradicts another or makes different recommendations based on its own philosophies and program preferences.

Continuing education:

One of the most important marks of professional care providers is their ability to recognize gaps in their knowledge and skills and seek out opportunities to self-improve. This continuous learning process is essential to maintain awareness of and provide the latest evidence-based practices and recommendations. Unfortunately, relying on providers to accomplish this task without support or verification leaves the system and the patients in it vulnerable to potential error. Agencies must establish and adopt education and quality assurance programs. Recertification can be a driver for the individual and service to improve.

Conclusion:

Standards are essential for obtaining positive results in providing prehospital medical care to a population. It is the responsibility of leaders, educators, and administrators to do the following to remain up-to-date on the latest evidence-based medical research findings. Stakeholders must work together to establish clear standards and protocols based on evidence. Leaders must ensure that the necessary equipment and supplies are available.

Educating providers on how to apply new knowledge and perform skills should be paired with accreditation processes and independent third-party verification of competency.

When the above criteria are met, prehospital care must integrate with the healthcare system, so that care that is begun on the street is continued in the hospital.

To find out more about NAEMT, please visit their website: www.naemt.org

Biography: Juan C. Cardona, NREMT-P, CEMSO, MPA

Juan C. Cardona, NREMT-P, CEMSO, MPA; is EMS Division Chief and Infection Control Officer at the Coral Springs-Parkland Fire Department in Coral Springs, Florida, USA, and is an EMS educator.

Biography: Aaron Miranda, EMT-P, FP-C

Aaron Miranda, EMT-P, FP-C; is Fire Captain at the Poway Fire Department in Poway, California, USA, and is an EMS educator.

Biography: David Page, MS, NRP, PHD(c)

David Page, MS, NRP, PHD(c); is Director of the University of California at Los Angeles Prehospital Care Research Forum and an EMS educator, who resides in Minneapolis, Minnesota, USA.

How the International Paramedic Registry Can Help:

The International Paramedic Registry (IPR) is helping improve patient care by verifying that providers know and can provide minimally acceptable care that meets international standards. Upon successful completion of cognitive and psychomotor exams, providers will be certified and recertified by an internationally recognized and respected entity. The IPR is being supported by a large and diverse group of established organizations in the United States and internationally.

Formally established in 2017, IPR is currently in a research phase, piloting exams worldwide to ensure that the validity and reliability of exams meet international testing standards. IPR expects to launch its certification process in 2019.

It is critical that high-quality and up-to-date patient care is provided, regardless of the EMS delivery system. Verification of knowledge, skills, and professional attributes will be achieved using psychometrically validated measurements. Individuals, service providers, associations, and countries can adopt and recognize IPR certification. The IPR will have levels of prehospital certifications and culturally appropriate certification titles for those who achieve competency.

The IPR is based on international patient care standards that are accepted worldwide. The exam items and scenarios are adapted to an appropriate cultural context and language, while maintaining the important international standard. Experienced IPR representatives supervise each exam on-site, and subject matter experts assess psychomotor skills in realistic scenario-based simulations.

It is important to note that regardless of the type or location of a provider's education, the provider must meet the standard for certification. As an example, the standards for chest compression during CPR should be the same regardless of the person providing CPR. Establishing clear standards assures that the level of care delivered is at least comparable and maybe even consistent across international boundaries.

Verification by a valid exam from a credible organization can be extremely valuable to employers and service providers who seek qualified workers and would normally have to verify competency after employment, at a potentially high cost. The IPR can therefore provide a pathway by which an EMS provider's competencies are verified.

Supporting the IPR is the International College of Paramedicine (ICP). The purpose of ICP is to improve the quality of prehospital and out-of-hospital patient care through the development of model standards of practice, professional competence, and education for paramedicine. ICP will utilize EMS education standards from countries that possess a robust EMS system as a foundation to establish a set of model education standards, and will advocate globally for the adoption of EMS standards of care, education standards, and verification of provider competencies.

NAEMT Education around the world

NAEMT courses are taught to civilian and military emergency responders all over the globe! NAEMT education programs are based on the belief that superior continuing education is essential to the consistent delivery of high-quality, evidence-based medical care. NAEMT education emphasizes critical thinking skills to obtain the best outcomes for patients. We believe that EMS practitioners are better prepared to make critical decisions on behalf of their patients when given a sound foundation of key principles and evidence-based knowledge.

TAIWAN | Prehospital Trauma Life Support (PHTLS)

USA | Advanced Medical Life Support Basics (AMLS Basics)

USA | EMS Vehicle Operator Safety (EVOS)

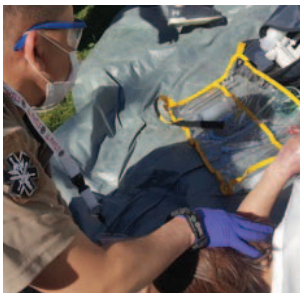
CANADA | Geriatric Education for EMS (GEMS)

CHINA | Prehospital Trauma Life Support (PHTLS)

MEXICO | All Hazards Disaster Response (AHDR)

SPAIN | Prehospital Trauma Life Support (PHTLS)

USA | Tactical Emergency Casualty Care (TECC)



CHILE | Prehospital Trauma Life Support (PHTLS)

NAEMT Education growth around the world

In 2018, NAEMT education continued steady growth, with the number of students taking NAEMT courses on track to reach 105,000 in the U.S. and internationally. NAEMT courses are offered in 70 countries and include 15 evidence-based and referenced courses.

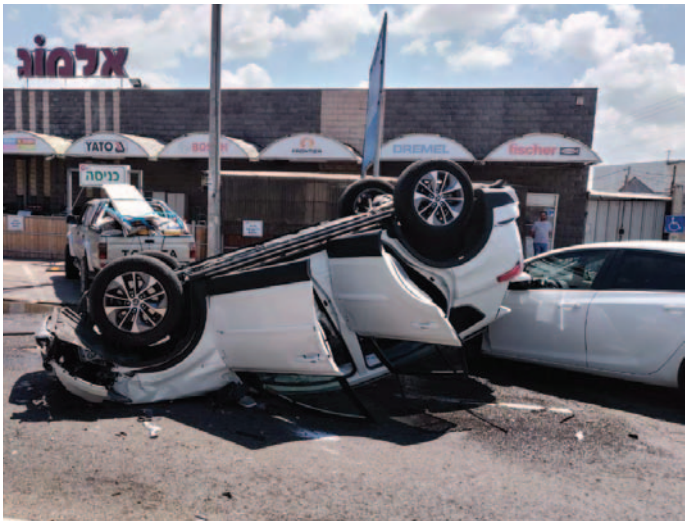
MDgo: Real time trauma analysis

Delivering a detailed trauma report the instant an auto-accident occurs

One of the worst aspects of the job of a paramedic or EMT is uncertainty. The first responder to an incident has no way of gauging the severity of an accident or the extremity of the injuries he/she will encounter on-scene. That is until now. MDgo is an Israeli start-up that has developed a revolutionary, real time trauma analysis system which works inexpensively with a modern automobile's existing sensors. Using AI technology, MDgo instantly creates a trauma analysis report, allowing emergency services to estimate the severity of the crash, the equipment and number of ambulances needed, and to put nearby health facilities on stand-by. All of this before a first responder even begins travelling to a scene. As we're sure you'll agree, the implications of this are significant.

Since it began seeking investment in November 2017, and began officially operating earlier this year, Israel-based MDgo has already attracted $4 million in investment, won multiple international awards, signed capacity demonstration agreements with global mobility stakeholders and is running a pioneering trial with the Israeli EMS (MDA), involving 250,000 cars. Not bad for a company with just twelve employees!

The story began with a bike-ride three years ago. MDgo co-founder and CEO (then Medical student and keen triathlonist) Itay Bengad was out riding when a fellow cyclist friend failed to make a sharp bend. Itay would find his friend lying unconscious in a ditch and remembers the long, nervous minutes waiting for an ambulance to arrive, all the while having no idea what type and what severity of injuries his friend might have sustained. Thankfully, the friend would recover from his injuries, but reflecting on the accident, Itay thought of how many more such accidents occur every day on the roads in automobile crashes. How many lives could be



saved if this period of uncertainty before a responder arrives could be eliminated? It was in answer to this question that MDgo was conceived.

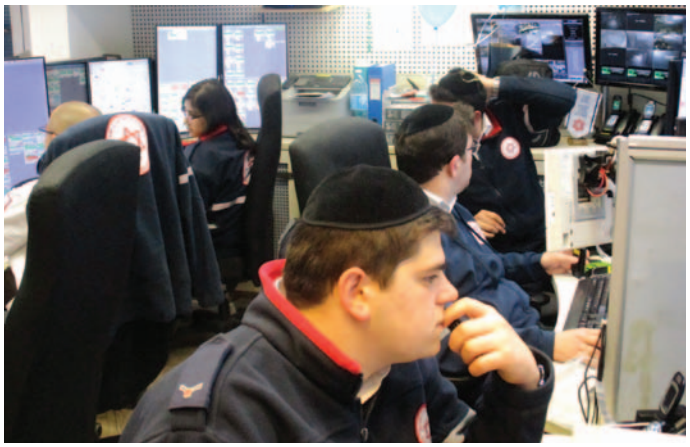
Itay teamed up with two of his school friends to make this concept a reality. Gilad Avrashi, Master of Science in electrical engineering at Technion and now CTO, would provide the technological know-how, and Eli Zerah Vice President for R&D would provide his advanced knowledge of software systems.

How it works

Every modern car manufactured in recent years (since around 2001) contains a large number of different sensors related to the vehicle's safety systems, as well as connectivity features related to the cars functionality. Typically, a car will feature seat sensors to count the number of passengers; a gyroscope to detect the vehicle's position in relation to the road; an accelerometer to gauge speed and an airbag system designed

to detect the force of an impact and which area of the car was damaged. In addition to this, modern cars have the capability to connect to the internet, a GPS system which tracks location and (now universally throughout Europe) the eCall system which automatically calls emergency services in the event of an accident. All of this means that a modern car with its intelligent systems is already collecting a massive amount of data about its status and the status of its passengers. Until now, none of this information was transmitted to emergency services in real time despite the fact that 44% of automobile fatalities occur because patients are not referred to the right hospital or are not treated properly on site. What the MDgo trauma analysis system does is collect and collate this information in a way that not only tells emergency responders the conditions in which the accident occurred, but also the conditions of the vehicle's passengers. So, what are the implications of this?

By utilising data on the forces acting on a vehicle and by comparing this to injuries sustained in thousands of other accidents, MDgo can instantly make accurate predictions on the conditions of passengers. "In the United States, there are 15,000 traffic accidents every day," said Gilad, "By using bio-mechanics and artificial intelligence, we developed the ability to create simulations even for accidents without documentation, in order to understand at any speed what forces are exerted on each organ of the body, and how serious the injury will be."



As customers will join the commercial service, MDgo will be able to provide additional life-saving information and deliver a personalized report to the first responders. Zerah explains: "The goal is to have as much personal information about the driver as possible which can help us in real time. Those who take blood thinners, for example, will be much more sensitive to bleeding after a car accident. Currently, this is information that rescuers only know after the fact. If we know the type of diseases and other medical history of the passengers, we can deliver an improved and holistic report.

A revolution in emergency response

With the rapid acknowledgement of the automobile industry, MDgo's life-saving technology could soon be integrated to all modern cars. The utilisation of MDgo would see the following benefits:

- The saving of lives of patients who would otherwise be referred to the wrong hospital or be treated with ill-suited or inadequate resources.

- Improved utilization and management of EMS and first responders, knowing what will be the right type and amount of utility to send to the scene (helicopter, intensive care, ambulance, etc.).

- A reduction in rehabilitation expenses. Patients who are treated quicker are less likely to suffer longer-term effects of their injuries. This is especially so in the case of neurological injuries.

- A reduction in the amount and cost of liability expenses. Accurate and immediate assessment limits the risk of fraud or mistreatment, protecting emergency responders against liability claims and also reducing the costs to hospitals.

The Future

Believe it or not, the detailed trauma analysis reports MDgo are currently providing are just the beginning in terms of what can be achieved in the future. MDgo is now officially listed with the USA's Food and Drug Administration (FDA) and CE marked as a medical device. The company currently has a partnership with the University of Virginia to conduct further research into the bio-mechanics of auto-accidents and is now in talks to set up trauma centres in Germany, Belgium and France to collect more valuable data from real accidents.

Looking into the future, and with the introduction of cameras and heart rate sensors in luxury cars, the scope for expanding the medical offering to vehicle passengers is massive. In the future, MDgo expects to provide routine check-ups as well, bringing the doctor onto the vehicle and alerting passengers regarding suspicious symptoms and needed check-ups. "We want to be the driver's doctor on a day-to-day basis, not just in the event of an accident."

Thanks to MDgo, the auto-crash patients of the future will no longer be left alone in the minutes following an accident and emergency responders will no longer be left with the uncertainty of wondering what they will face when they arrive on-scene. The right help will be on its way as soon as it's instantly identified and first responders and their patients will no longer be left in the dark.

To find out more about MDgo please visit their website at: www.MDgo.io
Or email Managing Director Shahar Samoelov at: Shahar@mdgo.io

Hands on Hearts: New Zealand & Australia lead the world in Restart a Heart Day activities

By Chris Hornsey

World Restart a Heart Day is an expanding global mission which aims to reduce the number of fatalities due to sudden cardiac arrests. Below Chris Hornsey of the Council of Ambulance Authorities (CAA) explains the importance of spreading CPR training across Australasia and reports on what is being done by Ambulance Services in Australia and New Zealand to achieve this mission.

As October 16, 2018 dawned, New Zealand paramedics were the first in the world to lock their hands together for World Restart a Heart Day (WRAHD).

More hearts were beating as Australia took up the challenge on the day designated to a world event in 2018 by the International Liaison Committee on Resuscitation (ILCOR).

The proximity to the International Date Line afforded both countries an opportunity to gain a head start in training communities in CPR and the use of AEDs as part of the international campaign to lift the survival rate for victims of sudden cardiac arrest.

Singapore followed as other parts of the world including European countries began their day of instruction in lifesaving techniques.

The inaugural international day was a significant phase in the campaign to generate greater awareness of sudden cardiac arrest (SCA), which claims more than 3 million lives across the world every year.

The first European Restart a Heart Day was held in 2013 following a declaration in the European Parliament supporting an annual day to promote awareness of bystander CPR, and pioneered in the UK by the Yorkshire Ambulance Service the following year.

Australian Prime Minister Scott Morrison launching CAA's World Restart a Heart Day campaign at Parliament House, Canberra

Ambulance Victoria (AV), Australia's third largest ambulance service, became involved in 2016.

Based on AV's successful campaign, the Council of Ambulance Authorities (CAA) instigated a campaign incorporating its ten-member ambulance services in Australia and New Zealand in a sector-wide leadership initiative not replicated anywhere else in the world.

Events were held in 2017 and in 2018 an expanded CAA campaign was launched in Australia's capital Canberra by the Prime Minister Scott Morrison.

Speaking on the lawns outside Parliament House, Mr Morrison likened the annual death toll from SCA to losing the entire population of a regional Australian city.

"Only one in ten survive. In some cases where they are close by to hospitals or emergency services, obviously that can improve. But for many it could be anywhere, at any time and it could rob loved ones from their families, friends, fathers, husbands, wives grandparents, all in an instant.

"Every shred of evidence tells us that lives are saved when a witness to a cardiac arrest, a bystander, steps up to perform CPR and if they can, use a defibrillator while an ambulance is on the way."

Biography: Chris Hornsey

Chris Hornsey is a Melbourne-based freelance writer and media adviser with more than 30 years experience working in Australia, the UK and Asia. Her special interests include health and aged care.

Focus on World Restart a Heart Day - Australasia

CAA Chief Executive David Waters said: "The incredible death toll from sudden cardiac arrest is unacceptable.

"There are more than 30,000 sudden cardiac arrests in Australia and New Zealand every year and 90 per cent of those people die. We know we can beat that with increased awareness and training more people in hands-only CPR and AED use.

"As one of the most trusted professions, paramedics are uniquely placed to capture the public's attention, garner their support to save lives and dispel myths around the dangers of performing CPR or using an AED."

Mr Waters said bystander intervention in the event of SCA had been proven to dramatically increase a person's chances of survival if action was taken within minutes.

"We know that for every minute that passes without CPR or an electric shock from an AED, a person's chance of survival drops by ten per cent. A bystander who witnesses someone collapse and fall into a lifeless state can make the difference between life and death by performing CPR.

"Call, Push, Shock is the key to bring someone back to life. Call the emergency number, begin CPR which may be assisted by the emergency call taker and apply a shock from a defibrillator (AED) if there is one to hand.

"These key actions and messages incorporate an important feature of a ten step program developed by the Resuscitation Academy (RA) in Seattle, and used as the basis for training in the pre-hospital sector across the world."

Mr Waters said exhaustive research in Seattle and King County, Washington, which has one of the world's highest survival rates at more than 60 per cent, had contributed extensively to the sector's knowledge and survival techniques.

Step 1	Establish a cardiac arrest registry
Step 2	Begin Telephone-CPR with ongoing training and Quality Improvement
Step 3	Begin high-performance EMS CPR with ongoing training and Quality Improvement
Step 4	Begin rapid dispatches
Step 5	Measure professional resuscitation using the defibrillator recording
Step 6	Begin an AED program for first responders
Step 7	Use smart technologies to extend CPR & public access defibrillation programs to notify volunteer bystanders who can respond to a nearby arrest to provide early CPR and defibrillation
Step 8	Make CPR and AED training mandatory in schools and the community
Step 9	Work toward accountability – submit annual reports to the community
Step 10	Work toward a Culture of Excellence

He said CAA had facilitated intensive training courses to support ambulance services, incorporate high-performance CPR and telephone CPR (T-CPR) for emergency call takers using the RA teachings.

"But while it's essential that our paramedics and call takers have expert training and high level skills, it's members of the public who are often the very first responders."

"Some 75 per cent of cardiac arrests occur in the home so we want people to be prepared."

"To build the public's confidence we also need to help people overcome their fears and dispel some myths."

"There is a fear that a person's ribs can be broken with rigorous CPR and of ensuing legal action but in most cases both scenarios are unlikely. Bystanders acting in good faith are protected under Good Samaritan laws."

"We need people to know that AEDs are safe to use."

Mr Waters said recent reports that men were reluctant to perform CPR on women fearing allegations of "unwanted touching" were alarming.

"Would these men want their mother, daughter, partner to be saved or abandoned because she was a woman?"

He said the proven success of hands-only CPR should also allay people's misgivings about mouth-to-mouth resuscitation.

Acknowledging the history of initiatives linked to SCA survival developed in other countries over many years including programs in Central and South America, Asia, Canada and South Africa, Mr Waters said he was enormously proud of the role ambulance services have played in the campaign.

He said the close ties services enjoyed with communities were also an ideal platform for collaboration with other mission-aligned organisations to broaden the life-saving messages around World Restart a Heart Day.

“At our Canberra launch we were fortunate to share the day with the ACT Ambulance Service, the Royal Flying Doctor Service, ACT Fire and Rescue, ACT SES and ACT Rural Fire Service. The involvement of so many other services similarly committed to saving lives, particularly in rural and remote parts of Australia, was fantastic.

“We were also grateful for campaign support from the Australian Resuscitation Council, The New Zealand Resuscitation Council, the Heart Foundation, Take Heart Australia, New Zealand Police, Stryker, ZOLL, Laerdal, Emergency Services Health and NEANN.”

Events were held in metropolitan, rural and remote regions of Australia and New Zealand at an array of venues from shopping centres, schools and airports to Sydney’s famous Bondi beach. Collectively some 20,000 people were educated in CPR and AED use.

Mr Waters said the 2019 campaign would build on the key messages of Call, Push, Shock.

“We want people to remember that it’s critical to act immediately if someone has a cardiac arrest, to remember that time matters.

“Everyone should learn the location of the two nearest AEDs to their work, home, school, sports club.

“We need more AEDs in the community and preferably registered with an ambulance service to help speedy access in an emergency.

“Anyone can have a cardiac arrest, anytime, anywhere, including children and teenagers and anyone can be a life saver. “

More information is available at www.restartaheart.net and www.restartaheart.co.nz

Guns, spoons and language issues: My research journey so far

Paramedic Sasha Johnston reports on her experience of dealing with mental health issues in the ambulance sector, which as you might expect, can be tough. Below, Sasha of SWASFT (South West Ambulance Service Foundation Trust) shares her personal experiences and explains her research findings on employee mental health support in the ambulance sector.

It was a cold bright day and the clocks were striking thirteen, well 06:30am. Orwell couldn't have predicted the real struggle, the one of finding something to stir a coffee with in the morning. Every ambulance station I work in there is a drawer filled with knives, but not a fork or spoon to be found. Mid sip the radio beeps with the sound that I'm sure will still make me jump long after I have left the service and I am dispatched to my first emergency call. The coffee helps as the children took it in turns to wake me up last night with tales of sharks under the bed and requests to correctly realign bedding, but it is a nice day and I am looking forward to a rare shift on my own without a student to support, lovely (don't get me wrong, students rock, but I have two small children therefore any alone time is precious!). I arrive on scene, climb out of my rapid response car and the patient has a gun and a rather large knife. The sun is still shining, it's early and there aren't many people around, but that's definitely a gun and after I managed to squeak out 'what can I do to help?', it was clear that my help wasn't wanted. Whilst I pressed the emergency button I had to hope that a suitably trained police officer had also found something to stir their coffee with that morning.

Peaceful resolution was found and I finished my shift, however, the colours were brighter, I couldn't sleep and the first signs of hypervigilance appeared. It wasn't until a few weeks later when driving to a routine call that I clipped a wing mirror; that was my last straw. I returned the ambulance to base and went home and that could have been the end of my career. However, I am lucky, my ambulance trust offers a Staying Well Service where staff can be signposted to a range of physical and mental health support services. I recognised that I needed to get help and was signposted to the Red Poppy trauma counselling service where I received the support I needed to help me cope with the aftermath of that day and the accumulative effects of my 16 years with the ambulance service that this event triggered. Sometimes just taking time to breathe can make a difference and learning that it's not just okay to take time to look after yourself, but it is actually your duty to do so if you want to ensure you give the best of yourself to your patients and your family.

I returned to work and life went on, until a message on social media highlighted that a colleague had been diagnosed with stage four metastatic melanoma. She had been given only three months to live and needed £70,000 to embark on an experimental cancer treatment called TILS (Tumour Infiltrating Lymphocytes) that wasn't available on the NHS. I had worked with Kath a few times at the beginning of my career and wanted to help. A social media trend of the 'Running Man' was being replicated by emergency services from across the globe and on a sunny May morning over 100 ambulance staff gathered outside Bristol Suspension Bridge to prove that we probably shouldn't give up our day jobs by dancing the 'Running Man' to raise awareness and money for Kath. Two weeks and a lot of media interviews later, we had raised almost £80,000 to pay for TILS. Ambulance staff really can do anything when they work together as a team. Kath gave us the opportunity to claw back some of the camaraderie that has been lost as the ever-increasing demand for 999 services strips us from our time together in the crew room, which used to be our natural coping/de-stressing/learning environment. Kath embarked on TILS and I became runner-up for the 2016 Pride of Britain fundraiser of the year award.

The spoon issue persisted but there was a positivity in the air and we all felt that we had made a difference and then a colleague died by suicide. The impact of working for the ambulance service was forced back onto the agenda in a cruel and shocking way. It was unlikely to just be about work, but I resolved to find the best way of making sure that staff needs are prioritised and properly supported. Cancer finally took Kath from us, but she stubbornly outlived her prognosis by over a year and died on her 41st Birthday, her bravery and candour will inspire the green team for many years to come.

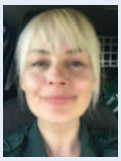
I had started a Masters in Advanced Practice when a colleague mentioned the opportunity of funding through the National Institute for Health Research (NIHR) and Health Education England (HEE). I applied for, and succeeded, in securing funding to embark on a Masters in Clinical Research (MClinRes) with the University of Plymouth with a proposal to explore mandatory support for ambulance staff. The beginnings of my Advanced Practice MSc were converted into a PGCert. Despite enjoying the Advanced Practice modules completed so far, as an IHCD qualified Paramedic who doesn't hold a BSc the thought of a Masters in a subject I knew little about was daunting to say the least.

I sat in my first taught lesson and immediately realised I had made a terrible mistake, I didn't understand a word anyone was saying and anything I had learned in the last 16 years was going to be of little use to me in there. This wasn't helped when the feedback from my first essay included the comment 'we appreciate English may not be your first language', totally embarrassing; removing conjunctions to hit the word count turns out not to be the best strategy in higher education – hey ho, we live and learn!

After emerging from the quantitative statistics module, I think I am slowly beginning to get to grips with clinical research and on the quiet I might even be enjoying it! The opportunities that are opening up are amazing. The University of the West of England (UWE) offered me my first opportunity to present at a conference. A generous thirty-minute slot was given to enable me to discuss the mental health and wellbeing of ambulance staff and I descended into panic. However, as odd coincidences in life go, the Las Vegas mass casualty shooting had just occurred and a friend of mine whom I worked with in the Caribbean had the misfortune of being the first paramedic on scene. He agreed to record a reflection of his experience and how this impacted his mental health. Another colleague then put me in touch with the first paramedic on scene at the Westminster Bridge terror attack who also agreed to provide a reflective account of the event. These amazing clips were played during UWE's Advanced Practice conference to not only pad out my thirty-minute slot, but to contextualise the need for systems of support for ambulance staff. The presentation was well received (and I didn't fall over or otherwise embarrass myself – bonus!) and although I felt nervous, I was able to take strength from Kath and realise that with a deep breath anything can be achieved.

The topic of mental health and wellbeing of ambulance staff was garnering interest; a BBC TV interview followed, along with a number of radio interviews across the Southwest of England. I secured a place as a member of the Mental Heath and Wellbeing of Paramedic Steering group with the College of Paramedics, joined Public Health England's South West Worklessness, Health and Work network and Bristol City Council's Thrive at Work task group. The Association of Ambulance Chief Executives (AACE) then held the first global summit for Paramedic Mental Health and again another 30-minute presentation slot was generously offered. This gave me the absolute privilege of presenting the Westminster Bridge reflection on the one-year anniversary of the event to a room of global ambulance service leaders committed to improving the mental health and wellbeing of ambulance staff.

Biography: Sasha Johnston



Sasha is passionate about enhancing patient care through improving the working lives of ambulance staff. She has worked as a paramedic for the past 16 years in Bristol, UK and Grand Cayman in the Caribbean. She recently completed an ASPIRE leadership programme with South Western Ambulance NHS Foundation Trust (SWASfT), is a member of the College of Paramedics 'Paramedic mental health and well-being steering group', a member of Bristol City Council's 'Thrive at Work' task force, SWASfT's Mental Health and Well-Being task group and Public Health England South West's Work, Worklessness and Health Network Group. She is currently studying for an MSc in Clinical Research with the University of Plymouth, funded by Health Education England and the National Institute for Health Research. Sasha's research explores ambulance staff perceptions and experiences of employee mental health support.

Since then I have developed a survey to explore staff perceptions and experiences of employee mental health support in South Western Ambulance NHS Foundation Trust (SWASFT). This has given me the opportunity to explore the pitfalls and challenges in developing quantitative research and highlighted how invaluable patient and public involvement (PPI) in research is. A reference group of SWASFT staff have supported me throughout the development process and I have learned the value of using both an expert panel pilot and a participant pilot for ensuring validity and accuracy. I must have re-read that survey hundreds of times and yet little errors were still picked up by the eagle eyes of the pilot participants. The survey is now live and has been distributed across SWASFT's large geographical area. The results will provide a baseline of staff perceptions and experiences of current mental health support and reveal whether the symptoms of the impact of workplace events are being avoided and whether mandatory support would be acceptable to staff.

The next step will depend upon whether I can secure funding to develop the evidence base for Mandatory Impact Monitoring (MIM). MIM builds on the advice offered by the Stevenson and Farmer (2017) review to give every member of staff time to talk about the impact the workplace is having on them and ensure opportunity for signposting to Staying Well services when required. By mandating time to talk I hope cultural change will ensue; normalising that talking is what is needed to stay mentally healthy whilst working for the ambulance service and reducing any stigma associated with seeking-help for symptoms of mental ill health.

Despite the challenges I have faced in the workplace I still love being a Paramedic, when we make a positive difference for a patient there really is nothing like it. I am grateful that I have been well supported but feel anxious that this may not be the case for all of my colleagues. There are many support systems that can make a genuine difference to our mental health and wellbeing and I hope that when the next colleague thinks of taking their own life that they feel able to reach out and ask for help instead. Through the MClinRes I have discovered Post-Traumatic Growth and now know that good can emerge from the bad. Talking about workplace challenges can make a difference; ambulance staff are innovative, caring, courageous, problem-solvers (you've heard about the spoon/fork problem – just eating lunch is an adventure) and if we can use these talents to take care of ourselves and each other, the possibilities for improving patient care are endless.

To find out more about Sasha's ongoing research please feel welcome to email her at: Sasha.Johnston@swast.nhs.uk

The Great War was not great at all

By Thijs Gras

As many of our regular readers will know, Thijs Gras is Europe's leading expert on ambulance history. In this column, Thijs reflects upon the not-so-great, Great War and the use of ambulance vehicles in the early 20th Century. Very fittingly in the centenary of the ending of the Great War, below Thijs gives us a valuable insight into the effects the First World War had on ambulance workers and volunteers who worked throughout on the frontline.

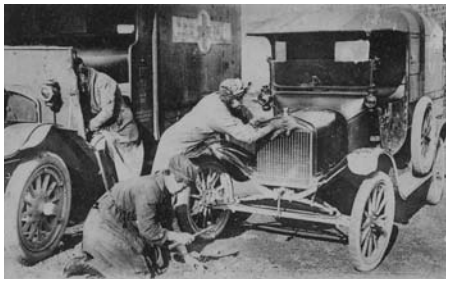
In a previous issue I took you back to 1918, to the Spanish Influenza nobody expected that raged over the world. But 1918 was also special in another world-scale ambulance related aspect: it was the last year of what the English call The Great War and others refer to as the First World War.

This war started in 1914 and coincided with the rise of the use of motorised ambulance vehicles in city streets to transport sick and wounded. Armies still used mainly horse-powered ambulances, but most also had motor ambulance companies. These were small units: at the outbreak of war in 1914 the French army had only 40 motor ambulances. The cars were simple, with coachwork made of wood. Suspension was available but not sophisticated. They were basic vehicles with hardly any medical equipment, just technical tools to change tyres and do simple repairs. In the back there was hardly room to take care of the wounded soldiers, the focus was clearly on transport.

The enormous amount of wounded in the battlefields overcharged the transport capabilities of the armies and they had to call for backup. Many private individuals and organizations like Red Cross, Friends Ambulance Unit or Salvation Army, provided ambulance units. In France a number of volunteer American ambulance organizations entered the war, among which the American Field Service became famous.

These American ambulance organizations employed young university students, mostly coming from the richer families. Some were able to drive, spoke French and were eager to defend the French culture against the Boches (which was the term for the Germans, referring to their boots). All were attracted by the prospect of a life changing, adventurous experience.

In those days, giving a phone call to your family at the other side of the ocean was not possible, so they kept in contact by writing letters. Many of these letters have been printed and a lot of the volunteers kept diaries and wrote memoirs, which were published during or after the war. These writings give us a good insight into what these guys have been through.



Apart from the students, numerous other volunteers, among them even women, joined them, with the idea that giving ambulance care was a noble and good deed. Which of course it was: they saved lives and reduced suffering. You really cannot imagine what they have seen: piles of dead and wounded young men, moaning, groaning, screaming, sighing, sobbing, crying, undergoing excruciating pain, aggravated by being hustled in a rusty ambulance. Litres of morphine and gallons of cognac were necessary to ease the pain of patients or to help them die peacefully. Many men were deformed, missed one or more limbs, had their bowels exposed, or suffered from shellshock.

The ambulance drivers drove their ambulances safely, sometimes through pitch darkness or heavy mist, over bumpy, stony and sandy roads full of shell holes, avoiding being hit by shrapnel or bullets. They worked 24 hour shifts, during battles extended to 48 hours or even longer! Their comradeship and dedication to the patients dragged them through the horrors. When you read their writings, you find that one way or another, they found a way to become accustomed to it. It is amazing what a person can bear.

You may think, what on earth moved these people to volunteer to do this work? But I think we still recognise this double feeling: you know you are going to see horrible things, you are even putting your life in danger (hundreds of ambulance drivers lost their lives), but there is this strange attraction that you want to help but you also want to be part of it.

It is sad that violence and war is still going on in the world of 2018. A difference with 1918: there is no world war, but war is all over the world. Numerous dedicated ambulance men and women go through the same experiences as their predecessors a hundred years ago. This may not be a happy thought at the end of the year, but we must be honest and realistic. Violence is there and we, as ambulance personnel, have to deal with it. Reading the experiences of the young people in World War One gives one insight into what they went through and how they dealt with their experiences. It can help you to give your experiences with violence a place in your life.

William Boyd, one of the ambulance drivers, suggested in his memoirs that the people who were responsible for the war should spend a few hours in a dressing station. That would have cured them from starting or prolonging it. We as today's ambulance men and women, standing in the frontline every day, cannot but agree with William.

Let us hope for a year with less violence worldwide …

Tell Thijs what you think about this article by emailing him at: tgras@xs4all.nl

Can we prevent the next death of an electric bicycle rider?

Electric bicycles are claiming casualties in Israel, with young people as the primary victims. Just a few weeks ago, 17 year-old, Ari Nesher, a youth volunteer at Magen David Adom, lost his life, his death causing uproar across the nation. Israel's rescue organization is doing its best to fight this life-threatening phenomenon, which is putting thousands of people at risk, however can this *chronicle of a death foretold* be stopped?

A license to kill

All across the world, and in Israel in particular, the advent of the electric bicycle has been received with great enthusiasm, as it seems to offer a solution for some urgent needs, including: available transportation all days of the week, and especially on the weekends, when public transportation in Israel is unavailable; a solution for traffic and parking shortage problems; an affordable means of transportation that does not entail "wasting" time and money in the long process of obtaining a license, etc. Alongside these advantages, however, there is one clear disadvantage: the riders' lack of understanding of the road rules, which causes many fatal accidents. As proof, the number of deaths this year is double compared to the previous year, and counting.

Most riders are teenagers aged 14 – 17, who ride the bikes to school. A great deal of them use these bikes much earlier than the legal driving age in Israel, putting themselves, pedestrians, and other drivers on the road in danger with their recklessness. Since there are no regulated pathways for electric bicycles, the young riders "zigzag" between the sidewalk and the road, causing drivers to brake suddenly, and they themselves are as well frequently caught off-guard, in events that end, as mentioned, in severe injuries and even death.

Worrisome findings

A study published in August by the Ministry of Science and Technology found that their usage of electric bicycles is significantly higher than any other means of transportation (e.g. walking to school, using public transportation, or being driven by their parents), revealing rather shocking findings.

At least 62% of the young riders had been in life-threatening situations, narrowly avoiding an accident; 67% of them prefer riding on the sidewalk, thus putting themselves, and the pedestrians walking beside them, at risk; 73% do not wear a helmet or other means of protection while riding, a finding reinforced by the horrible reality Magen David Adom teams must face when arriving on the scene of an accident, and witnessing the severe condition and multiple injuries of the victims.

Furthermore, nearly all of those who had participated in the study admitted that they ride through crosswalks, instead of walking their bikes as the law requires; 50% of them do not make sure to slow down before entering an intersection, thus "surprising" the drivers who cannot brake in time, causing impact; and 37% do not even know the speed limit for riding.

Magen David Adom is fighting electric bicycles accidents

Magen David Adom believes that the main avenue for fighting electric bicycles is through prevention, and therefore it has launched a campaign to raise awareness to the risks of reckless riding, and expose the public to the warnings and safety measures involving the use of electric bicycles. The advocacy work is being done in a number of ways, which are listed below.

Media appearances by Magen David Adom officials

In interviews, they explained the serious nature of these accidents, and the low chances of survival for those involved. Moreover, they warned the public, mainly the parents of the young unprotected riders, to familiarize them with the road rules and ensure their safety.

Advocacy efforts in schools and high-schools across the country

Magen David Adom volunteers, both youth and adults, go to classes and speak with the students about the danger involved in riding electric bicycles. They tell stories about injuries they had encountered during their volunteer work, and encourage them to follow the safety rules.

Community days for the general public

Over the last year, widespread advocacy work has been done for the general public in public places such as malls and parks. Magen David Adom volunteers have met with the public, discussed the dangers, and encouraged them to take precautions.

Reducing the response time to the scene of the accident

Alongside the vigorous work done in order to raise public awareness while specifically targeting the riders, Magen David Adom has prepared a medical response for cases where the riders are either responsible for the injuries, or are injured themselves, while emphasizing the activation of first-responders who arrive on the scene using private vehicles, Magen David Adom motorcycles, and electric vehicles within a few minutes from the time of the accident, providing lifesaving medical assistance until the Magen David Adom team arrives with the ambulance.

Shifting gear!

Magen David Adom is not stopping there. With the help of 10,000 youth volunteers, the organization is planning to increase its advocacy efforts with a "one on one" method, which includes giving lectures in the classrooms, inviting teenagers to meetings at the Magen David Adom stations and speaking with the riders' parents, all in an effort to try and prevent the next accident, and the next loss of life.

To find out more about MDA:
Email: info@mda.org.il
www.facebook.com/mdaonline

What are your chances in a sinking vehicle?

Protocol can get you out ALIVE

IAED's Audrey Fraizer talks us through how their organisation is helping to reduce the number of fatalities that occur in submerged vehicles and how they have updated their Protocol Systems to save lives.

What are your chances of dying in a submerged vehicle?

That depends on several variables and, in part, where you live and, overall, vehicle submersion carries one of the highest mortality rates of any type of single-vehicle accident.

In the Netherlands, crashes in which cars are submerged in water are not rare—due to the country's numerous bodies of water—and are often severe. Of these incidents, 70 percent of the vehicles involved are passenger vehicles.[1] In North America about 400 individuals die each year in submersed vehicles; in Canada 7 percent of all drownings occur in vehicles.[2]

If you're in a sinking vehicle and call an emergency number from a cell phone, do you expect the emergency dispatcher to know what to tell you? In that case, survival can depend on the protocols in use.

The instructions to get out of a sinking vehicle and vehicle stuck in floodwater are part of the International Academies of Emergency Dispatch® (IAED™) Protocol Systems, and recently updated for the Version 7.0 release of the Fire Protocol Dispatch System™ (FPDS®).

Emergency Fire Dispatchers (EFDs) now have a protocol dedicated to sinking vehicles and vehicles in floodwater (separated out from the Water Rescue protocol), in addition to the existing Dispatch Life Support (DLS) Pre-Arrival Instructions. According to new Chief Complaint Selection Rules (also added in Version 7.0), EFDs go directly to PAIs without obtaining an address, phone number, or name during Case Entry. Sinking vehicles are considered occupied until proven otherwise.

The change prioritizes the potentially hazardous consequences of these calls, said Mike Thompson, Program Administrator – Fire, Priority Dispatch System.

"They are very unique incidents and have some specific needs in terms of information and instructions," Thompson said. "They needed their own level of attention and detail that they couldn't get while mixed in with all the other Water Rescue incidents."

The update builds on PAIs developed by the IAED in close association with Canadian researcher Gordon Giesbrecht, professor of thermophysiology at the University of Manitoba, Winnipeg, Manitoba, Canada, and through his research with former assistant Gerre McDonald.

Giesbrecht operates the Laboratory for Exercise and Environmental Medicine where he studies human responses to exercise/work in extreme environments. He is known for his studies in cold water physiology and escaping from vehicles submerged in water. The latter interest developed not at all coincidentally to the drowning of Karla Gutierrez, a 32-year-old woman, who died (Feb. 16, 2001) in a sinking vehicle after calling 911 (the North American emergency number) and waiting for help to arrive. The call revealed the limitations of instructions available at the dispatch level. The emergency dispatcher didn't know what to do.

An audiotape of the call deeply affected Giesbrecht.

"I listened to her drown," he said. "I was left thinking of how do we change the system."

Giesbrecht knew there had to be a better way than asking location and telling people that help was on the way. That was too late. There were too many factors involved.

Somebody had to do something.

Giesbrecht entered uncharted waters, literally. He and McDonald created Operation ALIVE (Automobile submersion: Lessons In Vehicle Escape) to conduct repeated vehicle submersions with volunteers attempting various exiting strategies throughout the submersion process. Based on their trials, they concluded that vehicles pass through three distinct phases after landing in water, and that public awareness of these phases would help increase understanding of proper exit timing and strategies.[3]

In a study published in 2006, Giesbrecht and McDonald suggested public education focusing on immediate self-rescue through exit during the floating phase; from landing in the water until water rose high enough to push against the side windows and prevent them from opening. All vehicles float, anywhere between 30 seconds to 2 minutes, and Giesbrecht figured there was a lot people could accomplish in the limited amount of floating time. They also dispelled prevailing escape strategies.

For example, people trapped in a sinking vehicle cannot count on opening doors, waiting for the vehicle to fill with water in order to equalize the pressure, or breathing trapped air. Water pressure prevents the opening of doors almost immediately and the same goes for windows within about one minute. Waiting for the car to fill with water (equalizing pressure) before trying to open the door can backfire since the occupant will likely drown before this occurs. Drivers and passengers cannot count on air trapped within the vehicle to save their lives. All the air will eventually escape through the rear trunk and there will be no "air bubbles."

If response doesn't make it to the scene within one minute, and the vehicle is fully submerged, occupants can't count on being rescued.

Giesbrecht and McDonald also recommended developing 911 response protocols specifically for vehicle submersion cases, and in which the emergency dispatcher focuses attention on providing valid escape strategies.

The paper caught the IAED's attention and, in 2010, Giesbrecht was asked to participate in the IAED commissioned "Vehicle Submersion Subcommittee" to help create an evidence-based revision of the existing "vehicle in water" protocol (released in 2001).

Giesbrecht's reaction was one of relief:

"I thought I'd died and went to heaven," Giesbrecht said. "Something more was being done."

The subcommittee's work resulted in the protocol being approved by the IAED Fire Council of Standards in 2013.

The PAIs follow commonly accepted advice regarding a vehicle in water, which include: don't panic, do not use your cell phone (until safely out of the vehicle), and follow four action points (SEATBELTS off; WINDOWS open or broken; OUT immediately; CHILDREN first, released from restraints) (SWOC). Since sinking vehicle occupants may still call the emergency number for assistance, the PAIs follow the principles of this advice in order to promote rapid self-exit and survival.

Again, the update released in FPDS v7.0 creates a separate protocol addressing sinking vehicles and vehicles in floodwaters and adds two Chief Complaint Selection Rules.

Giesbrecht is of the opinion that calling the three- digit emergency number actually steals precious seconds away from the caller's chance for survival. Your car isn't going to wait for you to make the call and sadly, people have lost their lives waiting for response to arrive when not given the proper exit instructions.

He realizes however, that the call made in a state of panic is inevitable and prioritizes the availability of instructions from the communication center. In a panic, people are apt to forget what they should do and rely on someone coaching them to safety.

A research paper Giesbrecht published in the Annals of Emergency Dispatch and Response concluded that the *"protocol should prevent drowning deaths in occupants who call emergency dispatch from a sinking vehicle, as it is very unlikely that a dispatched rescue team will arrive in time to achieve a successful rescue".*[4]

The protocol's use in the real world confirmed the prevention strategy. In January 2018, a Collier County Sheriff's Office (CCSO) emergency dispatcher using the sinking vehicle PAIs calmly guided a woman and her infant out of a vehicle sinking in water. Both mom and baby were reported to be doing fine following the accident and suffered no injuries.

"If we can get someone to do CPR over the phone, we can get them out of the car, and now we have the proof," Giesbrecht said.

In an ideal world, Giesbrecht would teach "seatbelts off, windows open, release children first, and OUT immediately" at the same level as the "stop, drop, and roll," a fire injury prevention technique taught in schools.

"Every child in North America knows what to do when their clothes catch fire," he said. "But the rate of your clothes catching on fire [exclusive of a confined space fire] is much lower than the rate of people getting submerged in their vehicles. People have to be taught what to do."

Sources

1 "Cars submerged in water." Institute for Road Safety Research, SWOV, Leidschendam, the Netherlands, April 2012 http://www.swov.nl/rapport/Factsheets/UK/ FS_Cars_in_water.pdf (accessed Oct. 16, 2018)

2 Giesbrect G, Mcdonald G. Operation ALIVE (Automobile submersion: Lessons In Vehicle Escape). 2014: Dec.16. https://www.researchgate.net/publication/267699212_*Operation_ALIVE_Automobile_submersion_Lessons_In_Vehicle_Escape* [accessed Oct 16 2018].

3 See note 2.

4 Giesbrecht G. *The evidence for a new evidence-based "vehicle in water" emergency dispatch protocol.* Annals of Emergency Dispatch and Response. 2016: March 20. https://www.aedrjournal.org/the-evidence-base-for-a-new-vehicle-in-water-emergency-dispatch-protocol/ (accessed Oct. 16, 2018)

To find out more about IAED or to get involved, visit: www.emergencydispatch.org

TASC The Ambulance Staff Charity launches roadshow and volunteer training

Throughout the year, TASC The Ambulance Staff Charity holds events that support current and retired Ambulance Services staff and their families. A recent event held by TASC was a pilot Support Services Roadshow aimed at supporting ambulance staff in the Midlands.

The event, held at New Hall Hotel, in Sutton Coldfield, near Birmingham, on Thursday 15 November, was aimed at making the process of accessing quick support both simple and effective.

During the course of the roadshow a variety of qualified professionals were on hand to provide one-to-one sessions for ambulance staff, offering confidential support, advice and information to those in need.

As this was a pilot roadshow, it was only available to ambulance staff in the Midlands, specifically those working for East Midlands Ambulance Service, West Midlands Ambulance Service, and independent ambulance companies within the Midlands.

However, further sessions will be held in other parts of the country in 2019.

Angie Crashley, Support Services Manager at TASC, said: "Everyone needs a bit of extra support now and then, and sometimes all it takes is a quick chat with a professional to get you back on track. That's why we decided to pilot this event. We were delighted that so many ambulance staff were able to attend and reach out to TASC for support and advice on a whole range of issues and services that we provide."

The pilot Support Services Roadshow follows on from a number of 'surgeries' held across Wales in January this year. TASC is now going back out on the road after listening and responding to feedback and changing needs by taking services out to where staff are.

Among the organisations represented by professionals at New Hall Hotel were The Red Poppy Company, which provides trained and experienced counsellors offering support over the effects of work-related stress, personal stress and trauma.

Auriga has 20 years' experience in helping people to reduce their financial hardship. Their counsellors are expert in providing welfare and debt advice, budgeting advice, and benefits checks, as well as the areas of appeals and tribunals where necessary.

Cruse Bereavement Care, which is the leading national charity for bereaved people in England, Wales and Northern Ireland, offers support, advice and information to children, young people and adults when someone dies.

Anyone seeking support can contact TASC on 0800 1032 999 or email support@theasc.org.uk.

More info about the full range of support services provided by TASC, including physical rehabilitation and welfare advice, is available by visiting www.theasc.org.uk.

Angie Crashley, TASC Support Services Manager

Running in parallel to the pilot Support Services Roadshow, TASC also delivered its first ever Peer Support Volunteer training at New Hall Hotel.

The half-day training course was aimed at equipping TASC Peer Support Volunteers with an in-depth understanding of the services that TASC can provide in order that they may be able to fulfil their Volunteer role more effectively.

In addition, it sought to enable Peer Support Volunteers to offer initial support on behalf of TASC to colleagues in times of need, help them deal more effectively with difficult conversations, and provide the tools needed to support colleagues through listening, sharing experiences and signposting to TASC's Support Services team.

During the half-day sessions, experts from The Red Poppy Company, Auriga, and Cruse Bereavement Care spoke to attendees on the training course about TASC's mental health, debt management, bereavement and suicide support services.

There were also presentations from Marieanne Curtis, Volunteer Coordinator at TASC, and Angie Crashley, TASC's Support Services Manager.

Marieanne said: "We are very grateful to all our volunteers for everything they do to promote our work, and it's exciting to have now launched this new Peer Support Volunteer role to add to the ways in which ambulance staff can help us to support more people in their time of need."

Anyone wanting to volunteer for TASC is urged to visit: www.theasc.org.uk/volunteer

or email Marieanne at volunteering@theasc.org.uk

or call 0247 7987 922.

For general inquiries, call 0247 7987 922, email enquiries@theasc.org.uk or visit www.theasc.org.uk

From the Africa Desk of *Ambulance Today*: I'm dreaming of a happy Christmas

By Michael Emmerich

Christmas; a time of happiness, joy and good-will. However Christmas is a tough time for EMS staff as Michael Emmerich discusses in his column below. Read on to hear his thoughts and suggestions on how to cope through this busy and often stressful period of the year.

This Africa Quarterly editorial has been challenging to write; as I wanted to desperately do a "light-hearted topic" about EMS in Africa over the December period. Not an easy task, trust me, as our profession is most often not light-hearted and fun. There is no frolicking in the snow in Africa, and medical teams in remote/austere areas of the continent have a lighter case load, whilst those in the metropolitan areas have an incredibly busy time.

I have been privileged (not sure if that is the correct word to use) to experience the December period in various metropolitan, rural and remote/austere settings across the continent, over the past 30 years, even having to do a long haul (14 hours) ICU aeromedical evacuation on the 26th of December one year. Although we did wear little red Santa hats on that flight, but no champagne or eggnog. But I digress, as I often do when left to my own devices.

Which brings me to what this edition's article is all about – 2018 for many EMS practitioners that I interact with in Southern Africa, has been a time of high stress; we have lost colleagues, faced rampant political instability and social unrest, encountered violence and aggression towards practitioners, witnessed damage to and theft of our equipment during calls. All told it has been a rough year, with many of us looking forward to 2019, but just not to this December period, with increased stress and tension and time away from loved ones.

Laughter is at times the best medicine (for patient and practitioner) during times of darkness, or to view it from another aspect, lightheartedness as a healing phenomenon. Positive emotions are linked with better health, longer life, and greater well-being. On the other hand, chronic anger, worry, and hostility increase the risk of developing heart disease, as people react to these feelings with raised blood pressure and stiffening of blood vessels. How does one go about becoming happier over this period?

While most people are spending time with family and loved ones, EMS practitioners are stuck at work looking after their respective communities. That's where positive psychology comes to the fore, exploring how people and institutions can support the quest for increased satisfaction and meaning.

The traditional approach is to move through the dark states of our mind. Grappling with memories and fears, is thought to facilitate a freer state of being. The poet Robert Frost wrote, "The best way out is always through." Meaning that to get some sort of healing for a situation, to get "out," we must embrace and go through our ordeal wholeheartedly, with inquiry and desire for self-awareness. But as it turns out, detachment may be more effective than immersion when it comes to managing angst. "Lightheartedness" may be a wiser path to enlightenment, peace and mental balance.

"It is through this process of struggling with adversity that changes may arise that propels the individual to a higher level of functioning than which existed prior to the event" (Linley & Joseph, 2004)

It is not easy to maintain a healthy, positive emotional state. People often misjudge what will make them happy and content. To my colleagues out there in the field over December, take time to look after yourselves and your (EMS) partner/s and lighten up on yourself (no one is perfect, or right all the time), and gently accept your humanness. Wear that silly Christmas hat, eat some fruitcake, pull some crackers… then go safely home to your loved ones.

To close out, ponder on these six science-based reasons, why laughter is the best medicine:

Laughter is a potent endorphin releaser

Laughter contagiously forms social bonds

Laughter fosters brain connectivity

Laughter is central to relationships

Laughter has an effect similar to antidepressants

Laughter protects your heart

David DiSalvo
Author of "Brain Changer: How Harnessing Your Brain's Power to Adapt Can Change Your Life" and "What Makes Your Brain Happy and Why You Should Do the Opposite"

Tell Michael what you think about this article by emailing him at: mikesnexus@gmail.com

If you have any ideas for special feature articles on ambulance care in any part of Africa, we would like to speak with you about them.

Equally, if you have any news items you would like us to run either in our magazine or on our daily-updated global ambulance news website please email us at: editor@ambulancetoday.co.uk

Wholly owned subsidiaries are not the solution to NHS trusts' financial woes, says UNISON

Responding to NHS Improvement's consultation on wholly owned subsidiaries, UNISON head of health Sara Gorton said:

"The recent growth in wholly owned subsidiaries is damaging for staff, patients and the wider NHS.

"There must be much more stringent tests when assessing trusts' plans to set up these private companies. They shouldn't be allowed to go ahead simply so cash-strapped trusts can reduce their VAT payments.

"No wholly owned subsidiary should be set up unless a trust can demonstrate it has the backing of its staff.

"The hope is that this consultation will see new tougher regulations coming into force. If that happens, all recently established subsidiaries should be re-investigated."

Forging an alliance to improve patient care

Three ambulance services have announced plans to form an alliance to improve efficiency and benefit patient care.

Between them, South East Coast, South Western and West Midlands ambulance services handle more than 2.5 million 999 calls every year. The three trusts plan to form an alliance that will see them working even more closely together to deliver efficiency savings to invest in front line services.

The alliance expects to deliver savings through initiatives such as the joint procurement of supplies, including equipment and fuel. In addition, the three will work collaboratively to share best practice for the benefit of patients and staff. They will also work on improving resilience between the organisations for planned events and major incidents. The work will draw upon existing benchmarking and evidence from the National Audit Office investigation into ambulance services, and more recently, the report from Lord Carter into efficiency and productivity.

There are no plans to merge services or restructure existing operations, but the changes mean that the three Trusts can make every pound of taxpayers' money work as efficiently as possible.

Daren Mochrie, Chief Executive of South East Coast Ambulance Service said: "This is the right thing to do for our patients and our staff. By forming this partnership, we will be able to bring together the knowledge and experience of three Trusts to explore ways to reduce variation in some areas and develop new joint initiatives that will untimely enhance the quality of care for our patients."

The decision to move towards an alliance was agreed on 20th Nov. by the Chief Executives and Chairs of the three Trusts follows the recommendations of the Carter Report, which described ambulance services working in an alliance to deliver efficiency savings and improved productivity.

SECAmb Chair, David Astley added: "I am confident that, by working closely in partnership with our colleagues from SWAST and WMAS, we will all be able to benefit from sharing best practice and making efficiencies through joint procurement to drive real improvements for our staff and our patients."

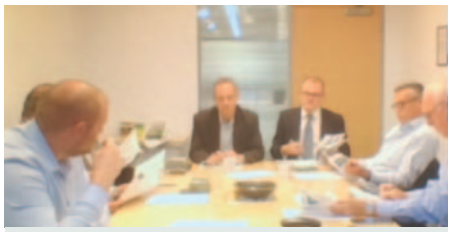
IAA quality framework

IAA Directors have agreed to take forward the development of a Quality Framework for their Members, that will have two discrete levels:

- **IAA Approved;** to ensure minimum standards are met for non-English located Members
- **IAA Assured;** a quality benchmark for Member companies meeting additional criteria

The Framework will operate independently and at 'arms-length' to the IAA Board, similar to the CQC and Department of Health.

Commenting, Executive Chairman Alan Howson said "The development of a quality framework is intended to provide additional assurance for commissioners and stakeholders on aspects not covered by the Care Quality Commission. It's also a huge statement on how seriously the Association and its Members take quality; unlike other so-called frameworks, it certainly won't be one side of A4 with self-declarations and a signed disclaimer."



Andy Newton (Chair) centre left next to Grant de Jongh (Chief Executive) from Health Practice Associates present to IAA Directors courtesy of IAA non-Executive Director Hayden Newtons who 'attended' the meeting using the GoTo platform.

IAA Health Practice Associates

Following a presentation from Andy Newton (HPA Chairman) and Grant de Jongh (HPA Chief Executive) on the Health Practice Associates register, IAA Directors have agreed to promote HPA as best practice specifically, for Members to:

- register as HPA Employer Users and utilise the register as part of their recruitment and clinical governance arrangements
- promote HPA registration with their staff, particularly at Technician and Emergency Care Assistants levels.

Commenting, Executive Chairman Alan Howson said "The development of a register for non-regulated care staff development is long overdue, even if it's on voluntary basis for now.

The initials EMT don't appear anywhere on the register either, and I've no doubt that the checks and declarations required by HPA will significantly improve the standard of care provided and ensure there is no safe-haven for those who really shouldn't be with patients."

Alan Howson welcomes Mat Hillman of Sirus Telecom as an IAA business partner.

IAA Market Place

The Association recently launched IAA Market Place for Members and Business Partners, who can post their items for sale as well as requests.

Commenting, Alan Howson said "We're pleased to provide this facility for our Members and others to buy from trusted partners, and further build a sense of the IAA community."

Ambulance team honoured at Cancer Care Innovations

A team of ambulance clinicians from the south west has been honoured for their innovative work in cancer care. The Macmillan Cancer Care Development team at the South Western Ambulance Service NHS Foundation Trust (SWASFT) won the Innovation Excellence Team award at the prestigious 2018 Macmillan Cancer Support Excellence Awards, held at The Birmingham Hilton Metropole Hotel on Thursday 8 November. Awards host, multi-award-winning journalist and broadcaster Victoria Derbyshire, presented project manager Joanne Stonehouse with the award. (See image).

As the Innovation Excellence award-winning team, they were considered to have demonstrated vision and commitment to make a lasting difference to the quality of services offered to people living with cancer.

The project has focussed on improving and promoting best practice in cancer, palliative and end of life care for patients living with cancer across the south west of England who access urgent and emergency care by calling 999.

As well as creating a broad education package for paramedics, the project team of four has also developed and improved systems and protocols to give ambulance clinicians access to specialist advice and guidance whilst they are on scene. Ultimately, this ensures cancer patients receive the right care in the right place at the right time.

Victoria Derbyshire, the team and Grainne Kavanagh, Head of Specialist Advisory and panel member

"What paramedics within SWASFT now have are options,' says Lynn Dunne, one of the project's three cancer care development facilitators. 'They know who to phone, they know what their resources are both in hours and during the out-of-hours periods, and they didn't have access to these things before. It doesn't mean that we don't take patients to hospital, it means that when appropriate we can treat people at home or facilitate a referral to a more appropriate health setting."

"It's been great for the patients and great for their relatives, but it's also been great for the paramedics too,' says Paramedic Joanne Stonehouse, the Macmillan cancer care project manager. "They now feel confident in these situations and knowing that they're able to do the right thing gives them increased job satisfaction."

The team has also received interest from other ambulances services across the UK and beyond, keen to learn from their experience.

Ed Murphy, Macmillan's Head of Services for the South West said "Congratulations to the Macmillan Cancer Care Development Project team at South Western Ambulance Service NHS Foundation Trust on winning the prestigious Macmillan Innovation Excellence Award. This pioneering project has provided much needed education and training to enable paramedics to give the best and most appropriate care to people with cancer. I am delighted that their hard work has been recognised by this award."

The Macmillan Excellence Awards, which are now in their seventh year, were developed to celebrate the outstanding work carried out by Macmillan health and social care professionals across the country. The event recognised excellence in three areas: service improvement, innovation and integration.

Over 350 health and social care professionals and guests attended the awards ceremony.

For support, information or if you have any questions, call Macmillan Cancer Support free on 0808 808 00 00 (Monday to Friday, 9am–8pm) or visit macmillan.org.uk.

Pakistan needs integrated emergency care systems: AKU symposium

Karachi, Pakistan, November 9, 2018: The global Disease Control Priorities Project estimates that nearly half of deaths and over a third of disability in low- and middle-income countries can be addressed by the implementation of effective emergency care.

"The solution is to establish integrated emergency and trauma care systems with pre- and post-emergency department care nationwide," said Dr Junaid Razzak, director of the Center for Global Emergency Care and professor of emergency medicine and international health at the Johns Hopkins University School of Medicine.

Dr Razzak was the keynote speaker at the inaugural ceremony of the Aga Khan University's 21st National Health Sciences Research Symposium that is focusing, this year, on 'emergency care: time and life matter'.

He recalled how he played a vital role in the establishment of emergency medicine as a specialty in Pakistan and became the founding chair of the department of emergency medicine at AKU – his alma mater – in 2008.

A group photo with the speakers

"Although College of Physicians and Surgeons Pakistan recognised emergency medicine as a specialty in 2011, there are not more than nine qualified emergency medicine specialists in the country today. Studies have also found significant gaps in the availability of essential resources, accessibility, patient-centricity and staff training," said Dr Razzak.

"This is an alarming situation in the country with a population of over 220 million. The impact on saving lives can only be achieved through a health system that is sponsored by the state with support from public and private institutions."

He stated that emergency care demands highly functional integrated health system, and complex and prompt care decisions. "We need a multi-prong strategy: predict the potential path of emergency care development if we follow the trajectory followed by the high income, more developed countries; and explore how new technologies such as telemedicine, artificial intelligence and machine learning can augment and impact the future of emergency care in low resource settings."

He stressed that emergency departments should aim to provide a safe, committed, compassionate and caring service.

"AKU and other academic institutions in Pakistan can play a significant role in developing and testing innovations for futuristic emergency care system," he added.

The second keynote speaker was Dr Scott Newton, a graduate of the Johns Hopkins University's Doctor of Nursing Practice

programme and the vice president of Care Model Solutions.

"Globally, emergency medicine is innovating to meet the demands of a growing population for care," said Dr Newton. "Increased demands do require an agile workforce ready for high-touch and high-tech practice."

"A well-established emergency care system can help achieve the United Nations' Sustainable Development Goals: Goal 3 on good health and well-being; Goal 11 on sustainable cities and communities; and Goal 16 on peace, justice and strong institutions," said Dr Asad Mian, head of the organising committee and the chair of AKU's department of emergency medicine, in his welcoming address. "Overall, good emergency care can improve outcomes in no less than 10 SDG targets," he said.

On the occasion, Dr David Arthur, dean of AKU's School of Nursing and Midwifery, and Dr Mushtaq Ahmed, interim dean of the Medical College; and Hans Kedzierski, chief executive officer of the Aga Khan University Hospital, also addressed the audience.

The symposium is to continue till November 11. The second day will cover discussions on women in medicine, emergency medicine development in Pakistan, moral dilemmas in emergencies, 'Ignite EM All', and several other sessions.

New learning disability zone is a communication breakthrough

The North East Ambulance Service has launched a new resource to support patients with learning disabilities.

A new online resource is now available on the Trust's website, giving people the information in an easy read format that will help them to choose which emergency service they require, be it NHS111 or 999.

Public Health England has stated that 40% of people with a learning disability reported having difficulty using health services. People with learning disabilities are two and a half times more likely to have health problems than other people and therefore many of the patients that staff provide aid to often have barriers to communication during triage and treatment. (Equal Treatment: Closing the Gap).

Engagement manager at the Trust, Mark Johns, explained why there was a need to develop information for different people who use the service. He said, "We know from patient feedback and surveys that people with learning disabilities find it harder to access and communicate with our service.

Information about how to use our services should be readily available to all members of the public, including people with learning disabilities, and we wanted to make sure that we tailored the information so that it's accessible to people who need it in a different format."

The NEAS learning disability zone has been created to reduce barriers to communication for people with learning disabilities to optimise patient experience and quality of care. The information is presented an illustrative form of what to do in an emergency, including a section of what to expect inside an ambulance with pictures and basic descriptions of the equipment in the vehicle.

A user led project group was set up with a community group which supports people with learning disabilities to understand the obstacles individuals face and to help design

new guidance on how to access emergency assistance.

Stephen Mckay Guidepost day centre officer said, "We support a diverse group of individuals with a wide range of learning disabilities and it's encouraging to see this work has taken into consideration the varied capacity and needs of these individuals and the end product speaks for itself. So many places create resources for people with learning disabilities without meaningful engagement with them.

"It's great that the group have been so heavily involved in creating this zone and actually really listened to. NEAS has broken down the barriers that people with learning disabilities can face when it comes to accessing the right healthcare services and developed a resource we think will help support others to understand the services they offer."

Mark continues "The project group explained their fears about being inside an ambulance and calling 999 so we've tried to allay their fears with more information about what happens once calling us and once on board an ambulance. We hope this new resource gives confidence to people when they come across and need our emergency services. For NEAS, it means that our call handlers will be aware of what to expect when arranging the appropriate help for the person in need, making the experience less stressful for all concerned."

NEAS also arranged for the project group to meet a paramedic who showed them around the inside of an ambulance and encouraged them to experience sitting on the stretcher and wearing an oxygen mask, should it ever happen to them in the future.

Carol who was one of the participants in the project group said, "I was terrified of the mask, that's why I asked to have a go. Now I won't be scared if I needed to ever use it in real life. I hope when people see my picture they won't feel scared too. The North East Ambulance Service's website is really good and I'm glad I got to tell the paramedics and other staff what I wanted to know."

Paul, who was another participant in the project group said, "The new NEAS website page is really good and I really like that NEAS listened to me and I will show other people so they can learn how to get help too."

You can find out more about the disability learning zone by following this link: www.neas.nhs.uk/patient-info/learning-disability-zone.aspx

HRH Prince Charles launches pioneering mental health care at London Ambulance Service

His Royal Highness Prince Charles visited London Ambulance Service today to meet frontline crews, call handlers and those working behind the scenes to respond to 999 and NHS 111 calls across the capital.

The Royal visit comes as the UK's busiest ambulance service launches its pioneering resource for patients experiencing a mental health crisis.

As part of his tour, His Royal Highness met specialist nurses working with paramedics to form a new team, dedicated to responding to 999 calls to patients with mental health problems – the first team of its kind in the country.

In the year the NHS celebrates its 70th anniversary, Prince Charles was shown a 1949 Daimler ambulance alongside the Service's modern fleet of ambulances, cars, motorbikes and bicycles. Focusing on how frontline staff are no longer "ambulance drivers" but highly skilled clinicians.

During his visit, Prince Charles met paramedics, doctors, pharmacists, midwives and mental health nurses, together with the wide variety of other staff whose skills are essential to operating the UK's largest ambulance service including: IT specialists; vehicle engineers; fleet, estates and logistics teams; clinical researchers; finance; HR and health and safety specialists.

Heather Lawrence OBE, Chair of London Ambulance Service, said: "It was a real privilege to be able to introduce His Royal Highness, Prince Charles, to our hardworking ambulance crews, call handlers and colleagues from every department. Our staff never fail to provide outstanding care to patients in London 24 hours a day."

CEO Garrett Emmerson said "It is an exciting time to be working for London Ambulance Service – we are developing medical and technological innovation and we are delighted that Prince Charles's visit coincided with our latest Pioneer Service: our mental health joint response car."

The scheme will see senior mental health nurses and experienced paramedics working together. Both clinicians will assess the patient, with the nurse able to assess mental health and provide brief psychological interventions and the paramedic will be able to assess and treat any physical injuries or pain.

Once they have assessed the patient, they can encourage them to make a GP appointment; refer them to their mental health team; or call an ambulance if they think they need to go to hospital.

The team will not be dispatched to patients who have taken an overdose or those detained under Section 136 of the Mental Health Act as they will need an ambulance.

Consultant Mental Health Nurse Carly Lynch said: "This is such a rewarding job because we respond to people at a time in their lives when they are most vulnerable.

"We never know what will happen in a day or who we will see but we do know that we will give patients the very best care. Often that will mean being able to treat them in their own home and helping to alleviate any distress."

Of all the calls London Ambulance Service receives every day, nearly 10 percent are from people experiencing mental health problems.

As well as reducing unnecessary and stressful hospital trips, the new mental health response team should free up ambulance crews who might otherwise spend a long time on scene dealing with a complex mental health case.

Today's visit from Prince Charles comes less than two years after separate visits from both his sons. When his youngest son, the Duke of Sussex, visited he joined London Ambulance Service staff in our 999 control room to talk about wellbeing. This visit was part of the Heads Together campaign to "change the conversation" on mental health, spearheaded by The Duke and Duchess of Cambridge and the Duke of Sussex.

Innovative App a potential game changer in cardiac survival across Wales

An App with the potential to revolutionise care in life-threatening emergencies throughout Wales, was launched in partnership with the Welsh Ambulance Service on Thursday November 1st 2018.

GoodSAM is a pioneering app and web based platform, which alerts trained and verified Responders to nearby medical emergencies, helping to radically reduce death from life-threatening illnesses such as cardiac arrest.

Evidence shows that response time is a critical factor in cardiac arrest and being able to alert volunteer GoodSAM Responders to quickly attend nearby emergencies, in support of the Ambulance service, will help to save lives.

The highly governed GoodSAM system works by asking Welsh Ambulance Service Staff and Community First Responders, to sign up as volunteer GoodSAM Responders. From today, when a life threatening medical emergency call is received in the Welsh Ambulance Service Control Room or through the GoodSAM app, an alert is sent to up to three GoodSAM Responders who are nearest the incident asking them to attend the scene. The GoodSAM Responders are also able to determine the location of the nearest defibrillator through the GoodSAM AED Registry.

The system does not replace the role of the Welsh Ambulance Service, with its own crews continuing to be dispatched and respond in the normal way.

In 2016-17 the Welsh Ambulance Service attended over 5800 cardiac arrests, where resuscitation was attempted in 2832 cases. The UK average shows less than 10% of patients survive. For both trauma and cardiac arrest, the major determinant of outcome is time to treatment, and the sooner effective Cardio Pulmonary Resuscitation (CPR) is started, the better the chance of survival. For every minute delay, a patient's chances of survival fall by 10%*. If a defibrillator is readily available, patients are six times as likely to survive.

By facilitating rapid administration of high quality resuscitation by the community, the impact of GoodSAM is potentially game changing for cardiac arrest survival rates across Wales.

Greg Lloyd, Head of Clinical for the Welsh Ambulance Service, said: "We are delighted to be working in partnership with the GoodSAM team. It's a well-established fact that the sooner effective CPR is started, the better the chance of survival for the patient. Getting a defibrillator to someone in cardiac arrest quickly, significantly increases their chance of survival. Working with

GoodSAM will give us an integrated approach to alerting our volunteer responders to a nearby cardiac arrest, where they can offer potentially life-saving help. That will, undoubtedly, be a major asset.

"It is important to stress that the GoodSAM system is an additional resource to the emergency ambulance response, and not a replacement for it. Our crews will continue to be dispatched and respond as emergency teams to reports of a patient in cardiac arrest in the way we already do."

Co-founded by Professor Mark Wilson, Neurosurgery Consultant and London Air Ambulance Doctor, and Ali Ghorbangholi, an Electronic Engineer, Big Data and Cloud Architect, GoodSAM has, since its launch, rapidly grown into a global community operating in over 30 countries and is endorsed by the UK Resuscitation Council.

Professor Mark Wilson, GoodSAM's Medical Director and Co-Founder, said: "If a patient has a cardiac arrest or a traumatic head injury, it is the first few minutes after the incident that determine the outcome – life, death, or long-term brain injury".

"There are first-aid trained people all around us, but usually the first they know of a neighbour having a cardiac arrest is when an ambulance appears in their street. If they could know, and start CPR immediately for even the few minutes prior to the ambulance arriving, the chances of survival for that patient can be considerably increased. GoodSAM now makes this possible, connecting those people who have the skills to the public in their minute of need."

Ali Ghorbangholi, Technical Director and Co-Founder said: "The technology has already been successfully integrated in UK Ambulance Services such as London, East Midlands and North West Ambulance Service and has more than proved its worth in saving lives. Now the people of Wales are set to benefit from the innovative technology."

Thanks to funding from the Cabinet Office and Big Lottery Fund, GoodSAM has helped to revolutionise care in life threatening emergencies and it is anticipated the App technology will be operating UK-wide by 2019.

The Welsh Ambulance Service continues to work in partnership with Welsh Government and third sector partners to strive to deliver the Out of Hospital Cardiac Arrest strategy in Wales.

**British Heart Foundation data*

Trust signs up to Armed Forces Covenant

South East Coast Ambulance Service NHS Foundation Trust, (SECAmb), has strengthened its relationship with the armed forces by signing up to the Armed Forces Covenant.

SECAmb has a long history of employing former military personnel as well as those who continue to serve in a voluntary capacity.

The covenant is a commitment to those who serve or who have served in the armed forces and their families and outlines how the Trust will support them, officially, by becoming a military-friendly employer.

Commitments set out in the covenant include:

- Promoting SECAmb as an armed forces-friendly organisation
- Seek to support the employment of veterans young and old and working with the Career Transition Partnership (CTP), in order to establish a tailored employment pathway for service leavers
- Endeavour to offer a degree of flexibility in granting leave for Service spouses and partners before, during and after a partner's deployment
- Seek to support our employees who choose to be members of the Reserve forces, including by accommodating their training and deployment where possible
- Aim to actively participate in Armed Forces Day

SECAmb's Executive Director of Operations Joe Garcia, who signed the covenant on behalf of the Trust, said: "SECAmb has a long history of employing both former military personnel and those who serve in a voluntary capacity. It's important that we maintain and strengthen these ties and I am very pleased that, as a Trust, we have made this official commitment.

"I would like to thank all past and present members of staff who have joined us from the armed forces or continue to serve as reservists and I would encourage others to consider, when the time is right for them, whether the ambulance service could be a good potential career move."

To read more about the covenant visit the Trust's website here: www.secamb.nhs.uk/about_us/armed_forces_covenant.aspx

Hundreds of people cared for closer to home thanks to new ambulance service role

Hundreds of people have avoided an unnecessary trip to hospital thanks to a new ambulance service role dedicated to providing patients with the right care closer to home.

Earlier this year, North West Ambulance Service NHS Trust (NWAS) launched a pilot of a new Urgent Care Practitioner role. The 12 nurses and paramedics respond to patients who have called 999 but could possibly receive support and treatment in the community, rather than having to go to hospital in an emergency ambulance.

Working on vehicles equipped to treat people on scene, the Urgent Care Practitioners ensure patients who can be cared for at home have all the help they need, referring them on to other local health services if required.

While nurses have been part of the ambulance workforce for a number of years, it is the first time they have been employed in NWAS in a role responding to patients.

Evaluation of the first few months of activity has showed that 72% of patients seen by the Urgent Care Practitioners have been provided with the right care, without needing an emergency ambulance to take them to hospital - this is known as 'see and treat'.

The Urgent Care Practitioners also spend some of their time working in the 999 control centres, speaking to patients on the telephone to provide clinical self-care advice – this is known as 'hear and treat'. Just over half (51%) of all the patients spoken to by the UCPs were supported over the phone without needing further ambulance service intervention.

In total, the pilot is estimated to have saved more than 1,000 ambulance journeys during a 90 day period, which is approximately 1,625 hours or almost 68 full days of emergency ambulance time.

This saving means emergency ambulance resources would have remained available to attend other, more serious incidents.

Nathan Garlick was an A&E nurse before he joined NWAS to become an Urgent Care Practitioner in Greater Manchester. He said: "I saw this job opportunity and immediately thought of the endless possibilities and immense potential. Nurses can make a huge difference to way pre-hospital care is delivered in the future and it's great to see the ambulance service responding to the changing needs of the public.

"We can conduct a holistic assessment of the patient's needs, looking at their health, social and wellbeing needs and how we can improve our patient's lives. We use every opportunity to promote health and self-care. We're getting a really excellent reception from patients, their relatives and other health care professionals and every day I get 100% job satisfaction."

The pilot evaluation follows the recent publication of the Lord Carter review which said that the NHS could free up millions of pounds if ambulance services were able to 'see and treat' more patients.

Mark Newton, Assistant Director of Transformation, said: "The findings from the Urgent Care Practitioner pilot are really encouraging. People deserve to get the right care, at the right time, in the right place, every time and for many, that doesn't necessarily mean an emergency ambulance to the nearest A&E department.

"The Urgent Care Practitioner pilot is just one of the initiatives we've been working on to ensure we're well placed to provide that right care closer to home and working together with local health care providers to support more patients in the community. This helps to keep ambulance resources free to respond more quickly to life-threatening emergencies."

For more information follow the Urgent Care Practitioners on Twitter @NwambUCP.

Body worn video cameras protect ambulance staff from violence & aggression

Edesix, UK-based market leaders in the provision of body worn cameras, has announced that the North East Ambulance Service (NEAS) is the first Ambulance Service in the UK to trial body worn video cameras.

Approximately 40 of the Trust's frontline staff will be trying out the use of body cameras in a bid to offer them greater support against the rise of incidents of violence and aggression.

Alan Gallagher, Head of Risk, said: "The health, safety and welfare of our staff are of upmost importance. We want to take every precaution possible to ensure that our employees are safe whilst at work.

"Our staff are reporting more incidents of this nature and we are working closely with the police and other partners to respond to those perpetrators with warning letters and, where necessary, criminal action. From previous reports, we know that most of these circumstances happen away from CCTV covered areas so using body worn video cameras will mean that our staff can record evidence of abuse or assaults when they happen, such as when they are in a residential property attending to a patient."

The number of reported physical assaults on NEAS staff has increased by 23% compared to last year.

Richie McBride, Chief Executive of Edesix commented, "We're pleased to provide the North East Ambulance Service with our cameras to enhance the protection of staff and to deter any aggressive behaviour towards NEAS workers."

For further information on Edesix products please contact:
Nicole Irvine
Marketing Manager
marketing@edesix.com
0131 550 3827
www.edesix.com.

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The Emergency Medical Services Show 2019

The Emergency Medical Services Show for clinical excellence and operational innovation will be the first of its kind held for paramedics, health workers, managers and partners. It is a conference and exhibition dedicated to emergency medical services in the United Kingdom and Europe to be held once a year and is stakeholders' opportunity to learn, innovate and benchmark.

This year, the event will be held 25-26th June 2019 at the ExCel, London. We will be welcoming over 200 speakers covering all of the important clinical, operational and business topics and best of all it is free to attend.

For more information visit:
www.terrapinn.com/emss

Eberspaecher acquires vehicle climate control specialist Kalori

- **Expansion of expertise in vehicle climate control**
- **Aiming to be the world's leading vendor of climate control systems for commercial and special vehicles**
- **Planned global growth**

Eberspaecher is expanding its expertise as a vendor of thermal management systems. The Esslingen-based automotive supplier yesterday signed a contract to acquire 100 percent of the shares in French company Kalori SAS.

Through this acquisition, Eberspaecher is boosting its strategic focus on vehicle climate control for special markets. With a staff of some 150, Kalori generated sales of just under 22 million euros in 2017/2018. Its customers include many leading manufacturers of commercial and special vehicles. The company's products are installed in off-highway applications such as construction, agricultural and forestry machinery, as well as in ambulances, minibuses and RVs. The heating and cooling systems enhance on-board comfort and safety. Eberspaecher will utilize Kalori's more than 25 years of experience and expertise by retaining its existing management to head the new Group subsidiary Eberspaecher Kalori SAS.

Climate control expertise for global growth

Eberspaecher will be able to scale up Kalori's experience in the development, application and production of air-conditioning and ventilation systems based on its global reach. The Group's market position will be boosted through its 19 subsidiary companies as well as through its global service and distribution network. The focus in developing new markets will be on the NAFTA region and South America. A second phase will target growth in the Asia-Pacific region. Over 100 people are engaged in sales, research and development, production and administration at the new Eberspaecher Group subsidiary's location in Lyon. A further 50 people work at the company's production plant in Zhongshan, China.

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Cartwright group announces expansion plans in North Lincolnshire

The Cartwright Group has confirmed the acquisition of a 26 acre site in North Lincolnshire to create a flagship base for Cartwright Conversions.

As part of its continued UK expansion programme, the Cartwright Group intends to relocate its vehicle conversions' division to the new site at Belton and expects to increase the number of jobs from 72 to around 250 over the next 18 months.

Cartwright Conversions was launched in 2016 and has gone from strength to strength under Commercial and Operations Director Steve Shaw and his team. The business produces a wide variety of specialised vehicles including a full range of ambulances for clients including the NHS and some of the UK's largest private ambulance companies.

To support the continued success and growth of Cartwright Conversions, Mark Cartwright approved this major investment to purchase the former Belton Brickworks and adjoining land to create a flagship base and relocate its conversions' business to the new premises.

A planning application for the demolition, redevelopment, and extension of the site has been submitted and, subject to planning, work will commence on site later this year with the aim of Cartwright Conversions being fully operational in the new facility in spring 2019.

Steve Shaw, Operations and Commercial Director of Cartwright Conversions, said: "This is a major move for Cartwright and shows the confidence the Group has in its conversions' business. The next 12 months promises to be a big year and we are looking forward to expanding our team."

For more information about the full range of conversions' products from Cartwright visit the website: www.cartwrightconversions.co.uk or call 0800 0320 279.

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For many large fleets, demands placed on both crew and vehicle can be extremely arduous, so it is of vital importance that both remain fully optimised to respond when it really matters. When considering these demands and agreeing on a build specification for your frontline ambulance, rapid response and patient transport service vehicles, Webasto will only specify products that meet the exacting standards and performance expected from Webasto.

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i-view™ is the new single use, fully disposable video laryngoscope from Intersurgical, providing the option of video laryngoscopy in the ER, ICU, maternity or the pre-hospital environment.

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www.intersurgical.com

Code Blue: Go-to suppliers of ambulance conversions

As 2018 draws to it's end, once again it's time to reflect on our achievements this year. From a business that was started in January 2016, we have rapidly become the go-to suppliers for bespoke ambulance conversions that cannot be built by our competitors. Our R&D and engineering capability allow us to rapidly provide solutions for our customers individual needs, from built in head rests for wheel chair positions, to seat belts release warning systems we are constantly advancing patient and crew safety, comfort, and overall experience during the patient journey. Highlights this year include supplying Ambulance Transfers LTD with a range of bespoke, dementia friendly PTS vehicles that are truly a game changer in the way the patient experience is delivered. We have provided a high tech simulation vehicle for the University of Sunderland, and a host of other Front line/HDU/PTS and secure vehicle conversions to our UK customers. We have also seen an upsurge in our export program, providing medical vehicles for health services across the world. Our unique range of stretchers, carry and stair chairs are also becoming increasingly popular, proving that there is an alternative to the equipment traditionally used. Finally, I would like to thank our customers and suppliers for their continued support, and wish all of you a wonderful Christmas and a very prosperous, and safe new year.

For information on our vehicle conversions and associated equipment, please visit:
www.codebluesv.com

A partnership approach to IPC

IPC is a specialist field, that's why a trusted, experienced and knowledgeable partner is required. **Zenith Hygiene Group is that specialist partner,** we have considerable experience in high-level infection control, hygiene protocols and systems, working in partnership with NHS Trusts, independent ambulance operators, deep-clean and make-ready professionals.

Zenith Hygiene Group offers a Total Hygiene System!
Having the right systems in place for maintaining IPC compliance is essential, Zenith's total hygiene system combines all the tools to run your business operations safely, hygienically and within regulatory frameworks.

The Right Products: The basis of the total hygiene system, are products specially formulated to be effective for use throughout emergency vehicle fleets which are independently proven against bacteria, spores and viruses.

Auditable Systems for a Robust IPC System: Zenith's bespoke Hygiene Service Reports, unique hygiene and IPC compliance tools, systems and ATP and swab testing is carried out by Zenith's team of experts as part of their standard on-site audits providing an auditable system demonstrating that a rigorous and robust IPC system is in place, it's well managed and, microbial cleanliness is achieved and verified.

The Right Training: Ranging from non-clinical IPC training, vehicle deep and daily cleaning to mandatory chemical product in-use-training. these training courses are combined with Zenith's bespoke Hygiene Service Reports, unique hygiene and IPC compliance tools and systems.

To discuss how we can help you and your business contact James Staniland - Director or Corporate Accounts – Medical at:
james.staniland@zhgplc.com

HAIX Airpower XR1: The versatile boot for emergency services

HAIX's Airpower XR1 is the ideal footwear choice for rescue and emergency services professionals that need footwear they can rely on. The boots offer outstanding comfort and stability, providing optimum levels of safety, enabling busy emergency services professionals to function on their feet across multiple terrains all day long.

The GORE® CROSSTECH® fabric incorporated into the boot provides breathability and superior comfort, delivering critical protection against penetration of blood, bodily fluids, water and common chemicals.

The Airpower XR1 meets the requirements of safety category S3 with an oil and petrol resistant sole, all terrain grip and a protective, composite toe cap and metal free midsoles.

With high quality leather upper, abrasion-resistant lining and a Sun-Reflect system that prevents the safety boots from getting too hot, the boots are both waterproof and breathable, providing functionality all year round. The cushioning wedge in the sole reduces stress on both the joints and spine, helping to reduce premature fatigue and leg cramps when working over extended periods. The shock absorbing heel cushions steps, reducing stress on the joints and back.

The sophisticated closure system enables a rapid snug fit to the individual foot. Simply lace using the patented lacing system with inner-lying crossover laces, which reduces the danger of hooking, and then pull up the zipper for a close fit.

Created for emergency services professionals, the Airpower XR1 will not let you down.

For more information, visit:
www.haix.co.uk/haix-airpower-xr1

Apex – Technology for Patient Transport

Apex Patient Transport Management Software (PTS) is a modern, SAAS based software package providing you with a high level of operational control, efficiency and record keeping for all your patient transport and first aid event work.

What started as a vehicle breakdown ended up being the catalyst of Apex PTS. Jamie Smith, Operations and Finance Manager of North West Private Ambulance Liaison Services (NWPALS) saw our vehicle recovery software in action and quickly got in touch with Apex. PTS was born. Today, Apex PTS cover all your operational and administrative needs to manage your patient transportation jobs. As one of our newest customers, Tri Medical, pointed out: "After a lot of research we found Apex to offer a great system at a very reasonable cost. It meets all our PT needs as well as maintenance, tracking, staff clocking in and a lot more"

Route planning, vehicle tracking, booking portals, event first aid management are all included as part of the offering.

Apex also provides high levels of security; they are ISO 27001 certified and use a cloud-based solution, with detailed historical record keeping to answer all the CQC audit questions.

"I believe it is the best system out there for private transport providers. The Apex team made it work for us; there was never a negative" - Jamie Smith, Operations and Finance Manager NWPAL

For further information please visit: www.apex-networks.com
T: 0203 195 6757
E: info@apex-networks.com

Capable

noun

- Having the ability, fitness, or quality necessary to do or achieve a specified thing.
  'AMZ Kutno - Capable, Quality Bodybuilders who understand your needs and build Ambulances to enhance your business'
- Able to achieve efficiently whatever one has to do; competent.
  'AMZ Kutno - A highly enthusiastic and capable partner'

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www.cartwrightconversions.co.uk

0800 0320 279
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