

Scott Fowler

Hello everyone, and welcome to the Case for Safety Podcast. I'm your host, Scott Fowler. Appreciate you being with us today. We're gonna be where we're gonna be navigating the world of head protection. talking about regulations, how you can ensure your team has the equipment they need to stay fit safe on the job. And here to share his insights on that. I'm very happy to welcome Joe Brandel, Business Development Manager for the North America Industry Safety Market at MIPS. Joe, welcome. Thank you so much for being here.

Joe Brandel

Thanks, Scott. Thanks for the invite.

Scott Fowler

Appreciate you coming on, excited for the conversation and I thought we could kind of start with the ten-thousand-foot view. You know, when you look at the landscape of head protection today, you know, what jumps out? What comes to mind for you?

Joe Brandel

Well, in head protection in the industrial market, there's definitely a movement towards better head protection, thank goodness. That that started several years ago where folks are recognizing the risks associated with the work involved in the industrial marketplace.

And so some employers have moved towards providing their employees with better head protection. And even OSHA, they came out with a safety and health bulletin more than two years ago, and they've decided to move into use an ANSI type two protection for all of their employees.

So it's a good thing. There's still plenty of work to do. There's still lots of opportunities for that, but it we're definitely seeing a trend in the industrial marketplace towards better head protection.

Scott Fowler

Talking about more work to do. What are some of those gaps that you see, you know, in in the market now and the risks those can create for, you know, the workers who need that head protection?

Joe Brandel

Well, the annual the researchers estimated the total annual cost for all construction related injuries in the US is more than eleven and a half billion in two thousand two. And so, of that about four billion accounts for fatalities, while seven billion accounts for non-fatal injuries.

So mostly driven by, you know, cases away from work. So, you know, what they need to do is basically, you know, think of better protection and some of the risks that are associated with that risk, you know, like with rotational motion, you know, it's relatively unknown common traumatic or cause of traumatic brain injury here in the US, well around the world.

And you know, it's a result of angle impacts to the head. You know, when a worker falls off a ladder and hits their head, it's most likely at an angle and that can induce rotation into their brain. And so, the brain is quite sensitive to that. And so those impacts need to be recognized and protection, better protection for that opportunity.

Scott Fowler

You mentioned OSHA there and, you know, recently moving towards, you know, di different types of head protection, better head protection. I wonder if you could talk a little bit about, you know, regulations related to head protection as far as OSHA's concerned, you know, what folks out there should need to know about, you know, complying with OSHA head protection standards.

Joe Brandel

Well, first of all, you know, OSHA requires the employers to do a risk assessment based on, you know, the risk that are involved with their employees related to head injury. So after they do that, you know, they prov need to provide, based on that risk assessment, head protection that complies with the ANSI standard, the Z89 or Z89.1, and various standards that are that are part of the OSHA standard. So they do need to comply with provide personal protective equipment, head protection that complies with that.

And you know, I know that ANSI is working on updating their standard. It's not out yet. It's not finalized, but hopefully that'll be out sometime this fall.

Scott Fowler

You mentioned the risk assessment there. You know, w when you think about you know, this for the safety professionals out there looking to provide, you know, the best head protection for their workforce, you know, what do they need to consider? You touched on it

little bit there, but what do they need to consider in that risk assessment process to ensure that, you know, they're gonna be providing an effective level of protection?

Joe Brandel

Well, you know, first and foremost, you know, traditional hard hats have been around forever, you know, for over a hundred years. And those traditional hard hats, I'm talking about ANSI type one hard hats, they protect for dropped objects, objects that hit on top of the head. So that's one of the risks that can happen not only on construction sites, but industrial sites as well, you know, other situations.

So, but they also need to, you know provide protection for the risk associated with, you know, side and angled impacts as well, because like I said, that can induce rotational motion into the brain and that that's a leading cause of traumatic brain injury.

So, part of that assessment, again, you know, assessing the risk, whether it's working at heights, whether it's the slips, trips, and falls, any kind of the situation where you might slip and hit your head, or like I said, fall from a height and hit your head. Those are very, you know, traumatic accidents that can cause serious brain injuries, especially when it induces rotational motion due to an angled impact instead of a linear impact to the head.

Scott Fowler

Talking about sorry, getting kinda into the weeds here, but talking about those different those different impacts. And I thought you talked like slips, trips and falls, things like that. Is it really a matter of safety professionals looking at each individual task that a worker's gonna be performing and really thinking about what could what could go wrong and the impact that could have, you know, as far as their head is concerned and what they can do to help mitigate those hazards and risks?

Joe Brandel

Absolutely. You know, there are certain there are obviously certain tasks or, you know, certain jobs within a you know, job site or even a facility that are going to be higher risk. And, you know, those the those that can cause the traumatic brain injury just do the severity of the impact to the head are the ones that obviously I mean any protection needs to be provided for any kind of a potential head injury.

And so, the higher risk are the ones that that induce that rotational motion to the brain due to the angular in impacts. And usually like I said, that it could be an object that hits your hits your head at an angle or your head hitting an angle when you when you fall or due to a slip trip or falling from height.

Scott Fowler

Talking about falling from heights, you know, we talk about you the ocean moving towards safety helmets. Hey, and in in the industry at large, is does that really go back to fall protection? Is it, you know, the move towards, you know, helmets and away from traditional hard hats? Is that, you know, the idea that if you fall off a building, your hard hat's gonna fall off with you? So just providing, you know, that better level of protection, something that's gonna stay on you if you should experience a fall from height?

Joe Brandel

You know, a lot of the fatalities are caused by, you know, the head protection product, whatever it is, you know, not staying on the worker's head during that fall. And, you know, they impact their head, you know, quite dramatically on an object or on the ground itself. And that can cause the traumatic brain injury. So absolutely, you know, it it's

It's part of the process of not only, you know, improving that protection with a better product, but keeping that product on your head.

Scott Fowler

I'm curious, I mean, we we've talked a lot about on the show, like different types of PPE and you know the maintenance and you know, they all experience wear and tear over time, you know. w what does that look like in in the world of head protection, you know, looking at, you know, hard hats, helmets, whatever it might be, to, you know, ensure that it continues to provide that that level of protection, you know, over weeks, months, years.

Joe Brandel

Well inspection is critical. And that goes for any personal protective equipment, any safety equipment, whether it's you know, glasses, or you know, your harness, gloves, you know, your footwear, you need to inspect it prior to use. That's an OSHA requirement and it's a requirement from all of the manufacturers as well. And you know, it's important because you know, you wanna make sure that the product you're that is supposed to protect you is in good condition and in in the situation able to do so.

So inspection, and even care after, you know, in between use is critical as well because you know, you have to you have to make sure that it's in in good proper storage and all of that as well. But inspection is the key, you know, that and that's up to the user. You know, all the training in the world means nothing if the if the user, the person using the personal

protective equipment isn't gonna make sure that before they use it it's been inspected and is in proper working condition.

Scott Fowler

And are there things in particular with head protection? I mean, obviously you've got a hard hat that's cracked or something like that, but you know, are there things, you know, during that inspection process that folks should be looking for to ensure that it's gonna provide that that level of protection they need?

Joe Brandel

Absolutely. You know, you mentioned one of them. Any kind of a crack, any kind of a damage. But even, you know, with some products, you know, the sunlight, too much sunlight can affect their performance as well, because the UV rays could degrade the performance of the product.

But you know, you're just looking for any s any sort of damage, whether it's the suspension inside of the inside of the helmet or the foam, the padding, whatever kind of shock absorbing material, or if it's a low friction liner, you know, make sure that it's in good working condition, that it's installed correctly.

You know, things can go wrong if you especially if you don't care for the product. If you're not you know, you may throw it around. It may fall out of your truck or it may do whatever. You know, things happen, but again, that's why inspection is so critical to make sure that it's in in good condition.

Scott Fowler

Kind of taking a broader a broader look again, you know, you talked about, you know, the current state of the industry and, you know, where things are going. But you know, when you think about it, you know, what do you do when it comes down to head protection, what do employers need to and safety professionals need to know to improve safety among construction workers? I know you could have these helmets in in, you know, any different environment, but you know, what are what are some key takeaways you want folks to know to help improve safety among their team?

Joe Brandel

Well just again, make sure during the risk assessment that you cover, you know, as all the scenarios that you can when it comes to potential head protection and you know head trauma and accidents related to that. You know, make sure that you're educated about the proper you know new the new idea or you know the new protection

that that's out there.

Again, like even like it was mentioned before, the, you know, the angled impacts, you know, that that cause rotation to the to the brain and can cause traumatic brain injury that way. They need to make sure that all of the risks are not, you know, it's virtually impossible to cover all, but you know, all of the major risks are covered with the product that they're providing.

Scott Fowler

I just thought of this, its come up in you know a lot of conversations when it comes to PPE is, you know, the importance of collaboration between, you know, your safety professionals, your procurement people, your suppliers, your workforce. Because, you know as we've talked about, proper fit is everything.

It's not gonna, you know, be able to protect you if it doesn't fit right. So I wonder you could talk a little bit about, you know, those relationships and how safety professionals can work with all those different groups to ensure that they're getting everybody on their team the equipment they need that's gonna fit properly.

Joe Brandel

Yeah, that's critical. You know, I I know that, you know, like any protect you know personal protective equipment, the more advanced it is typically that the cost are higher. So I understand there's challenges from a procurement or a budget process and standpoint. And you know, everybody that's involved in that process, and you mentioned all Scott, that you know, they all need to have buy in, if you will.

But you know, they all need to understand that, you know, a hard hat or a helmet is, you know, reducing the risk of something very, you know, traumatic happening, you know, head injuries are very expensive. According to OSHA's own risk calculator, just one concussion's worth fifty-five thousand dollars, you know.

So you know, and it and we do get some pushback in the industry when you're advancing personal protective equipment, you know, you'll hear a lot of man, that's expensive. Our budget doesn't allow for that. You know, what if you think of it from that standpoint, does it allow for a for a you know, I hate to just be dramatic, but a fatality?

Or a traumatic brain injury because those are very expensive. And so, you know, the cost up front may be higher than what was done in the past, but you're preventing a serious cost in the end. So absolutely, you know, providing a product that your workers are gonna wear.

And really understanding, you know, helping them understand, and that's this goes back to the training, helping them understand why it's needed, why a chin strap's needed, why, you know, protection from angled impacts which cause rotational motion, why that's needed, why you know we're moving from a from a type two or type one protective product to a type two, you know, and the linear impacts to the to the side and front and back of your head.

You know, all of that is through education, you know, not only for the workers, but, you know, it could be, like you said, procurement. It could be, you know, the safety folks. And education is constant in in this industry. And, you know, as research finds you know, more issues to solve and you know those solutions come about, again, that's why, you know, you need to educate the folks that are using it, buying it and you know distributing it and why it's needed.

Scott Fowler

I'm glad you mentioned training. That's a really important point. And you know, you touched on it a little bit there, but when you're talking about the workforce specifically, I mean, we hear stories workers say, a particular piece of PPE is gonna get in my way or, you know, hinder my productivity.

You know, could be any number of things. You know, what would you, you know, stress to those folks about, you know, why this is so important that, you know, they know how to use it, that they that they need to wear it number one and they know how to use it properly.

Joe Brandel

Yeah, I think the I think the hardest part is change, you know, for most folks. You know, I've been using this for twenty or thirty years or even two years. You know, why do I need to use this new thing? Or, you know, it's different than what I've been using in the past.

And again, I think if you explain to them, you know, why and maybe give examples of situations, you know, talk about unfortunately sometimes we have to talk about accidents or you know that in that included fatalities where a worker may have fallen off a ladder and his head protection product wasn't adequate and it fell off his head and that that worker died.

And you know, give them example real world examples of that happening and the product they're using now is made and designed to prevent that from happening. If it's worn

correctly. And then you know go over the go over the how and the why, how to use it, you know, how to properly fit it.

And you know, why exactly that that those you know features are needed. You know, you know, the chin strap, you know, it seems it seems logical, but you know, that that you know, why you need a chin strap to keep that helmet on your head. You know, it's definitely needed in the process.

Scott Fowler

And that kind of gets back to your earlier point too about making the business case for this. Yeah, you gotta make the case to your workforce, but you know, as you said, people say, this is expensive. It's like, well, if you have a serious injury of fatality, that could be even more expensive. So just strengthen that case for, you know, to everybody or in your organization for why this is worth the investment, why you need to wear it on the job site.

Joe Brandel

Yeah, because if you think about it, most personal protective equipment is being used to prevent those things. You know, you're that's the that's the entire point of wearing it, whether it's a harness or a cut resistant glove or eyewear, you know, you're preventing those injuries that that could possibly happen. And therefore, you know, you're lowering the you know the risk of it happening by using the more advanced person protective equipment and

And you know, and that's hard at you know, the hypotheticals of it possibly happening for some people are hard to imagine, but you know, it it happens all the time. There's fatalities that happen throughout the United States every year and far too many of them on the workforce.

Scott Fowler

Absolutely. And to your point at the at the top that you know, we have OSHA data and other data to back that up. I mean, obviously, you know, the fatalities themselves, you know, serious injury vitalities are awful enough, but you know, the financial cost that goes along with those is astronomical when you put it all together.

Joe Brandel

Yeah, it is. It's and you know, healthcare's gotten more expensive as you know, just as it advances as well. So that that's, you know, one of the things again, one of the reasons why you're trying to prevent it is no one wants to see a worker or a coworker and associate get hurt, obviously. I mean most but we also, you know, a lot of companies don't want those expenses related to those accidents. And so, you know, you do what you can to prevent it.

Scott Fowler

Okay, as we get ready to wrap up here, I wonder if could kind of look to the future. We've talked cat what where things are at now, where they're moving in. What are you know trends that you're seeing that you would encourage, you know, safety professionals employees out there to keep an eye on heading into the future?

Joe Brandel

Again, you know, be open to the new technology. and I know some of those you know the implementation for some folks is going to be difficult, you know, with their workers being resistant to it.

But again, you know, look at the new technology, look as far as, you know, protection, what it's protecting for, you know, the risk associated again with angled impacts that that can cause rotational motion to the brain, you know, more as the technology advances, you know, again, be open to it and then, you know, do your own research and do find out what you think works for your folks and your employees and coworkers.

Scott Fowler

Well said. That's what it's all about. As we talked about with the, you know, finding the right equipment, make sure it fits properly. It's all about finding the best equipment for your team. Well Joe, I will give you the last word.

Joe Brandel

Well thanks, Scott. Thanks again for inviting me. I appreciate the opportunity. And, you know, as we as we work in the industry to advance head protection, you know, we hope and we firmly believe that the injury rates and the fatality rates will continue to go down and that that's what we do it for. You know, that's the most important thing.

Scott Fowler

Absolutely. That's what, you know, the work of safety professionals is all about. And as I was thinking about today's conversation, you know, hard hats and helmets are, you know, synonymous with workplace safety. You see in all kinds of work sites and they play a critical role. And I really appreciate you coming on and talking about how they safety professionals can best provide the best head protection for their team. So, thank you so much again.

Joe Brandel

You're welcome and thanks for the invite.