Aviation Human Factors Industry News

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Hello all,

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In this weeks edition of *Aviation Human Factors Industry News* you will read the following stories:

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Improving lives, business and society with 'The Human Connection'

The collective works of ergonomists and human factors specialists across the UK has been published following the Ergonomics & Human Factors Conference 2016. A compilation of 29 thought-provoking case studies from a multitude of industries, 'The Human Connection' from The Chartered Institute of Ergonomics & Human Factors showcases the very latest projects in people-led design.

Led by the CIEHF's outgoing president, Professor Sarah Sharples, the publication demonstrates the innovation and diversity across the profession, and the numerous ways it touches people's every day lives.Professor Andrew McNaughton, Technical Director, HS2 Ltd said: "I'm delighted to see this document which highlights the extremely valuable contribution made by human factors professionals within a wide range of industrial settings. I'm personally aware from my work within the rail industry of the positive impact that systematic human factors activities can have on the workplaces of rail employees and the experience of rail passengers."

Ergonomists and human factors specialists have been at the heart of changes to safety critical systems, resulting in accidents being avoided and lives being saved. From the latest armourer vehicle design, and assessing workload in the rail industry, to designing for patient safety and safer neonatal care, each project is centered upon the way people interact and behave with the world around them, to design systems, technologies and processes that make our lives safer and more enjoyable.

Professor Sarah Sharples, CIEHF President 2015-16: "This document is intended to be of value to a wide range of audiences, including government, policy makers, industry, third sector groups, educators, research funders, regulatory bodies and collaborators. Ultimately we hope that this will become a document that we can all use to help to understand the complexity, range and value of the discipline of ergonomics and human factors."

The range and diversity of applications of ergonomics and human factors is immense. In aviation, the adoption of a human factors approach has changed the design of flightdecks and aircraft interiors. For many years, the high-hazard industries have recognized the importance of minimizing the risk from human error. The nuclear sector has led the way in understanding, measuring and improving reliability, and UK nuclear regulation is seen by many as the gold standard.

In healthcare, ergonomists and human factors specialists work in partnership with clinicians, managers and IT specialists to contribute towards a safe and resilient 21st century healthcare system. Much focus has been placed on improving communication between clinicians, ensuring that teams of doctors and nurses work together to make effective decisions and reduce the likelihood of harm. In addition to this important work, many pieces of equipment that we find in a clinical setting, from ambulances, to drips that deliver life-saving drugs, have been developed and evaluated by human factors experts.

Stephen Barraclough, CEO of the CIEHF said: “We have such a wealth of experience amongst our membership that I believe can change our systems, processes and the way we interact with the world around us for the better. *The Human Connection* takes a slice of this innovation to demonstrate the capabilities within the profession to make our lives safer, more efficient, and ultimately, more enjoyable.”

http://www.ergonomics.org.uk/wp-content/uploads/2015/05/CIEHF-case-studies-FINAL-1.pdf

To download your free copy of The Human Connection or visit www.ergonomics.org.uk.

The Chartered Institute of Ergonomics & Human Factors (CIEHF) is a professional membership body open to all which recognizes, protects and promotes standards of achievement demonstrated by ergonomists and human factors specialists.

Teaching Safety Culture in Human Factors Courses

As a follow-up to my last article on "Human Factors Hotspots," I wanted to delve a bit deeper into one of the points I had stated. I wrote, "It is clear that **safety culture** and **procedural deviations** are two of the most significant contributing factors in aviation maintenance-related accidents and incidents (and, typically, procedural deviations are a manifestation of an unhealthy safety culture)."

The reason for aiming in on this statement is so that I can discuss in more detail some of the limitations of HF training regarding procedural deviations being a manifestation of an unhealthy safety culture. These limitations, in no particular order, are as follows:

1. Although the topic of safety culture is important in an HF course, it's mostly targeted towards awareness. Don't expect to make paradigmatic culture changes as a result of your HF course!
2. The very people that can actually do something about making changes to the culture are most likely not even in your class (high-level managers often feel as if HF training is only for the people that turn wrenches).
3. Procedural error mitigation can certainly focus on the mechanics (since they are the last line of defense). However, if the mechanics are working within the brackets of a pathogenic safety culture, it will be difficult, if not impossible, to change the negative norms that have become ingrained in the culture. In other words, for real changes to happen, they must be initiated at the top of the organization.
4. The health of your organization's safety culture can be very subjective based on whom you ask. Ask any upper- level manger and they will probably tell you that "the culture is fine." Ask a line mechanic and he/she may tell you that "the company is an accident waiting to happen."

Now, with all that being said, let's assume you are your company's HF instructor and you are going to teach a module on Safety Culture. Let's also assume that your company's safety culture is pathogenic (or, quite literally, "an accident waiting to happen"). How would you answer the following questions regarding the development and delivery of your Safety Culture training module?

1. In your HF course, would you skip the topic of Safety Culture altogether?
2. Would you ignore your own company's safety culture issues and teach the topic from a neutral, objective position?
3. Would you try to change the safety culture by teaching people how to improve the culture? (keeping in mind that mechanics may not be able to change the culture themselves; change needs to start at the top—and the people at the top are probably not going to be in your class).
4. Would you try to develop a special course just for management to address safety culture to see if you can initiate change from the top? If so, do you think management would be receptive to a high-level safety culture course tailored to them?

These questions are certainly something to ponder as an HF instructor. Personally, I am confronted with this dilemma every time I teach an HF course. To make matters even more interesting, I facilitate HF courses at aviation organizations all over the world—some with outstanding safety cultures—some, not so much. Very often, while I'm teaching line mechanics, there are tacit, sometimes palpable, signs of frustration and angst when the subject of safety culture comes up; it can also get eerily quiet in the room. This provides evidence that the culture may be suppressive, unjust, and untrusting. If so, then we know that procedural deviations are most likely a manifestation of the unhealthy safety culture that exists, which can negatively affect mechanics' performance through such channels as fatigue, pressure, norms, distractions, and stress. And if that's the case, then you can expect your discussion on safety culture to be nothing more than nice-to-know information for your course attendees. The procedural deviations will just keep happening.

Dr. Robert Baron is the President and Chief Consultant of The Aviation Consulting Group, Inc. He conducts extensive training, consulting and research in Line Operations Safety Audit (LOSA), Human Factors (HF), Safety Management Systems (SMS), and Crew Resource Management (CRM).

He consults with, and provides training to, hundreds of aviation organizations on a worldwide basis. Need to develop a customized in-house Human Factors program? TACG can help!

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Chernobyl Anniversary Recalls Helo Pilots' Bravery

The 30th anniversary of the Chernobyl disaster in the Soviet Union recalls the deaths and illnesses of thousands exposed to radiation, the devastation of the area around that nuclear plan — and the bravery of hundreds of helicopter pilots who worked to contain the disaster.
A series of problems during tests at the Ukraine plant on April 26, 1986, led to a rupture, steam explosions and a fire in reactor No. 4 that released radiation across the then-Soviet republics of Ukraine, Belarus and Russia; a radioactive plume drifted over the western Soviet Union and Europe. Hundreds of thousands were relocated from contaminated areas, and some predict the death tool from effects of radiation exposure will reach 4,000. Today, a roughly 20-mi (30-km) "exclusion zone" remains in place around the plant and is largely uninhabited.

More than 200,000 emergency workers fought the fire and struggled to shield nuclear material exposed by it and the preceding blasts.

They included about 600 Soviet pilots who flew thousands of flights to dump lead, sand, clay and concrete on reactor No. 4 in an attempt to seal off radiation. In the process, they exposed themselves to dangerous levels of it.

The many helicopter pilots who flew at Chernobyl were epitomized by Anatoly Grishchenko, a civilian test pilot who flew a Mi-28 during the operation. He died in Seattle on July 2, 1990, while being treated for leukemia that was widely considered to have been a result of his radiation exposure. "In the fraternity of helicopter pilots, Grishchenko's pinpoint flying and control of his enormous loads during the three-day struggle to contain the reactor made him an international aeronautical celebrity," the *Los Angeles Times* said in an obituary.

The *Times* credited U.S. helicopter pilot Cap Parlier, then director of testing at McDonnell Douglas testing in Mesa, Arizona, with driving efforts to arrange a bone-marrow transplant for Grishchenko in Seattle.

For his work at Chernobyl, Grishchenko was made a Hero of the Soviet Union. Shortly after his death, he was awarded the Flight Safety Foundation's Heroism Award.

Forest ranger documents Adirondack plane crash sites

In this April 3, 2016 photo, Scott Van Laer photographs pieces of a Cessna 207 that crashed into an Adirondack mountainside in 1970 in New York. The New York forest ranger is documenting dozens of plane crash sites in the Adirondack Mountains with plans for a book for fellow “wreck chasers” and hikers.

Hidden among the rugged mountains, spruce thickets and mossy bogs of New York's 6-million-acre Adirondack Park lie the remnants of dozens of planes that have met their doom over the decades.They include single-engine private planes, military jets and commercial aircraft. Some are well-known, like the Air Force B-47 bomber that crashed into Wright Peak in 1962, leaving wreckage visited by hikers to this day.

Others have nearly vanished, leaving little but scraps of canvas and rusted steel beneath ferns and fallen trees.

Forest Ranger Scott Van Laer has made it his mission to tell their stories. He's an aviation archaeologist, also known as a "wreck chaser." What started as a work assignment to update a list of crash sites has become an off-duty obsession involving hundreds of hours poring over Federal Aviation Administration and military crash records, interviewing old-timers, networking on web message boards and hiking to remote crash sites.

"This is one of the first planes I looked for," Van Laer said as he bushwhacked through dense woods and beaver marsh on a recent Sunday in search of a Cessna 207 "Skywagon" that crashed in 1970 in the Jay Mountain range of the northeastern Adirondacks. "Turns out I looked totally on the wrong mountain. That's because the crash list was put together by a ranger in the '80s before GPS. It wasn't precise."

This time, Van Laer was accompanied by local resident Jim Beaton, who had visited the site soon after the crash. Beaton led the way to the white and yellow shards of fuselage, wings and tail scattered through the swath of forest where Harvey Shaw, a former Air Force pilot, crashed in heavy fog and died. Van Laer documented the site with photographs and GPS readings.

In addition to cataloging crash sites for the Department of Environmental Conservation, Van Laer is writing a book about Adirondack plane crashes, which he expects to publish next year. He has documented more than 200 crashes in the region, with wreckage remaining in the woods from about 50. He has visited about two dozen sites. Some, long forgotten in remote areas, took multiple trips to find.

"One I'm still looking for is a Connecticut National Guard plane that went down in the Moose River Plains in 1956," he said. "The pilot dragged himself for 36 hours with a broken leg until some loggers saved him."

Some sites hold military history. One is on Blue Ridge in the central Adirondacks, where a U.S. Army C-46 transport plane crashed in 1944 during a night training mission, killing the three people on board. Despite an intense search, the wreckage wasn't found until nearly a year later by someone searching for a different lost aircraft.

"A group of wreck chasers found it about 15 years ago and put a plaque on the wing and hung a flag," Van Laer said. "Now a few people go to it every year."

As he searches for sites, Van Laer often seeks out surviving relatives to see if they want to visit the wrecks. In 2014, he led a pilot's son to wreckage of a Cherokee 140 on Iroquois Mountain on the 45th anniversary of the crash. "That one was celebratory because his father survived," he said.

One wreck remains a mystery. The twin-engine jet of an Atlanta developer crashed shortly after takeoff from Burlington, Vermont, in January 1971. A search ranging from the eastern Adirondacks to the Vermont side of Lake Champlain was fruitless. The jet and five men on board are still missing.

After Van Laer happened to meet the pilot's daughter on a wreck-chasing message board, he organized a search in Lake Champlain in 2014 involving state police divers and private contractors with a mini submarine. He helped family members organize another private search last year.

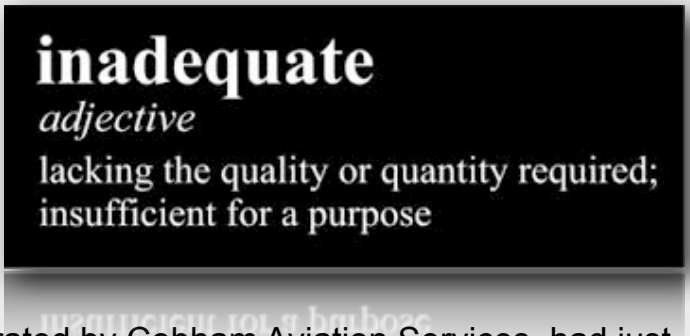
"That one's been tough," Van Laer said. "I really want to help bring closure to the family."

The pilot's niece, Barbara Nikitas, of Beverly Hills, California, said Van Laer is a godsend for a family that longs for answers after 45 years.

"It's been wonderful to have his support and knowledge," said Nikitas, 59. "Not knowing what happened has always been very devastating to us."

Engine fire in FIFO plane caused by inadequate repairs, ATSB finds

Inadequate repairs and inspection protocols were responsible for an engine fire that left a plane carrying fly-in, fly-out (FIFO) workers trailing flames across the Perth sky in 2014, according to the national aviation safety watchdog.



The four engine BAE 146 jet, operated by Cobham Aviation Services, had just taken off from Perth Airport bound for Barrow Island on April 29, 2014, when a fire broke out on the inner port side engine.Ninety-two passengers were on board, all FIFO workers, as well two pilots and three cabin crew.

Passengers described seeing flames and smoke coming from engine number two, while witnesses on the ground reported seeing a trail of fire and smoke behind the aircraft.

The pilots shut down the affected engine, extinguishing the fire, and the plane returned to Perth Airport where it landed safely.

An Australian Transport Safety Bureau (ATSB) investigation has found a welding nut in the engine's combustion housing had cracked due to fatigue, allowing high-pressure aviation fuel to escape through the engine cowling.

It also identified a grinding repair of the housing had been improperly performed, accelerating the welding nut's failure.

The ATSB also discovered routine visual inspections of the housing in question had been ineffective, as they did not take into account the effect of the improper grinding.

As a result of the incident Cobham Aviation inspected all similar engines on its fleet, finding one with a similar fault to that of the fire occurrence.

It also updated its maintenance manuals to address weld repair specifications.

Records show small but still alarming number of pilots fly under the influence

The good news: The number of pilots who fly or attempt to fly under the influence of alcohol and drugs, or engage in illegal behavior, is very low, according to Federal Aviation Administration records.

The bad news: There are still some pilots who are flying under the influence and engaging in illegal behavior. According to FAA records obtained by Fox News through a Freedom of Information Act request, 64 pilots of U.S. carriers were cited for violating alcohol and drug provisions from 2010 to 2015.

And 38 pilots tested positively for illegal drugs in 2015 alone.

The legal limit for alcohol for a pilot is 0.04 percent, which is half of the legal limit for automotive drivers.

On average, one pilot is caught over the limit per month in the U.S., the data shows.

The percentage of airline and airport staff - including pilots, mechanics, dispatchers, ground security and air traffic controllers - that tested at or below the alcohol limit in 2015 was about 0.2 percent, or 119 out of 56,000 tested.

That low number should be a comfort, but of course any incidents with commercial jets are alarming.
"According to FAA data, there is no leveling off or decrease in this trend, in fact drug use seems to be climbing," retired military pilot Peter Bartos told Fox News.

"The general public probably has no idea that this abuse is occurring with such regularity at certain airlines."

FAA Safety Briefing Departments

Notice Number: NOTC6502

The March/April 2016 issue of FAA Safety Briefing focuses on the #FlySafe campaign and combating loss of control (LOC) accidents.

Articles in this issue will help pilots better identify loss of control warning signs, as well as fine tune mitigation strategies and recovery techniques that can improve flight safety in these situations.In this issue's Jumpseat department (p. 1), Flight Standards Service's Director John Duncan reviews the what, why, and how of loss-of-control events, while Checklist (p 21) highlights some important FAA resources that can help you expand your knowledge on "staying in control."

Federal Air Surgeon Dr. James Fraser examines how incapacitation, both sudden and subtle, can lead to LOC in Aeromedical Advisory (p.6).

Nuts, Bolts, and Electrons (p.28) focuses on how you can learn more about your aircraft (and possibly save a few bucks) through owner assisted inspections. Angle of Attack (p 29) focuses on the NTSB's 2016 most wanted list of safety improvements.

The link to the online edition is: http://www.faa.gov/news/safety_briefing/. Also, be sure to follow us on Twitter - @FAASafetyBrief.

Safety Culture Part 2.

Submitted by Gordon Dupont
With permission from *D.O.M. Director of Maintenance* magazine

As a matter of interest, this is the 12th article featured under "The Human Error." I'm glad to still be around to write it and I really hope that you are finding them useful. Hopefully all readers completed the questionnaire in the last issue. If not, I suggest you find it and complete the 20 question determination of your company's Safety culture. That done, the added up number will provide the following indications:

If your score was between ***160 to 200*** – Wow that's hard to believe. Should be a great company to work for. You're not the CEO by any chance? But keep up the vigilance and don't get complacent.

If your score was between ***110 to 155*** – A good score. Keep working at it. There is always room to improve.

If your score was between ***60 to 105*** **–** Not too bad but there is a lot of room for improvement. It's time for management to sit down and form an action plan that involves everyone. Something is not working as it should. Perhaps another gap analysis and/or a Safety review is in order. A review of the results of the questionnaire completed by the whole company could help find some of the weaknesses.

If your score was between ***10 to 55*** **–** Not a good position to be in. The Company needs to work seriously on a Safety Management System. To do nothing is inviting disaster down the road and you really don't want to be there when it happens.

If your score was ***less than 10*** **–** Unless you've been working there less than a week: find a job with another company. The odds of a fatal accident are just too great.

Perhaps some of the policies, practices and procedures are in place but you just don't know about them. Take the time to find out more about any that you scored a **0** on. We all are part of the solution, even if the Safety culture is dependent on the top management's values and style.

According to Henry Mintzberg your Culture must have the 3 C's to be a true Safety Culture. They are:

Commitment - Management's true motivation and allocation of resources. In other words – "do they walk the talk" or "put their money where their mouth is". Without their sincere commitment, there can be no true Safety culture.

Competence - Knowledge of how to achieve the organization's Safety goals. Good intentions are not sufficient to have a Safety culture. This is where a correctly set up Safety Management System (SMS) can provide the guidance toward a Safety culture.

Cognizance - Awareness that it is a never ending battle. Here is where the policies and procedures of a properly functioning SMS will help ensure that it doesn't just become another "flavor of the month." SMS helps ensure that the Safety culture is ongoing.

Professor Ron Westrum developed three classifications of organizational culture. I've adapted them towards the Safety culture and added two more between Ron's. In my 55 years in aviation I've worked in and with all five. Where does your company fit in?

1. **Pathological** – *Accidents are the price of doing business*

- Don't waste time on Safety unless regulated to do so
- Production (Profit) over Safety organization
- Preoccupied with personal power and glory.
- Information & Ideas blocked and controlled
- Information is used to reward or punish
- Failure leads to punishment (I.e. demotion or firing)
- Almost impossible to reform

Tend to shoot the (Safety) messenger

A form of Pathological culture was very common in the past. Any error made resulted in being fired in order to set an example to the rest and to show that the person was "held accountable" for the error. Case closed. Thus, any mistake was hidden for fear of being fired and there were few, if any, "lessons learned" from an accident.

1.5 Reactive – *We'll fix the problem after an accident*

"Yep. Another careless person forgot where the ground was"

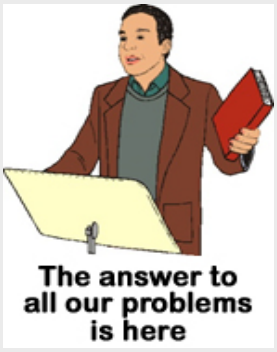
- Tends to look at Safety as a necessary evil
- Fails to see the importance of Safety
- Tends to look at Safety as just common sense and acts accordingly.
- Lessons learned come only after an accident
- Will react whenever an incident dictates a need to improve Safety
- May "talk the talk" but fails to "walk the talk" (do)

Tend to see the Safety messenger as a troublemaker

A step up from the pathological, the reactive at least tries to learn from an accident in order to prevent a repeat. This culture may hang up "Safety First" and "Be Careful" signs but fails to provide meaningful training to actually accomplish a Safety culture.

2. Bureaucratic – *If everyone just followed the rules, we'd have no accidents*

- Believes that Safety is simply ensuring that everyone follows the rules
- Preoccupied with rules and departmental turf
- "By the book" organization
- Emphasis is on process
- Information flows only along accepted channels
- New ideas create problems
- Functional in a stable environment
- Dysfunctional in a dynamic environment
- Reform it through the top-down only.



Tend to not listen to the (Safety) messenger

Anyone who works in government likely knows a form of this culture. It tends to feel that any problem can be solved with more rules. Any Safety concern will require a designated multiple page form be filled out in triplicate and delivered to a specific office. After going through several committees a new rule is produced to "solve" the problem. They "talk the talk" but it is difficult to get any Safety changes unless "the top" thinks of it.

2.5 Proactive – *We have a Safety problem and organized a Safety committee to deal with it*

- Takes Safety seriously but is not sure how to handle it
- Establishes a position or committee to handle Safety
- Management remains arm's length and delegates the responsibility
- Tends to be looked at as just another "flavor of the month" Safety initiative
- Many employees take a "wait and see" approach
- May look good on paper but little changes.

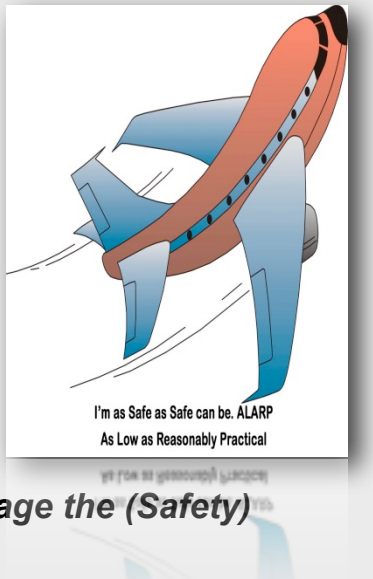
Tend to believe the (Safety) messenger but are not sure what to do

All too often after a serious accident or threats by the regulatory body to pull their OC (Operating Certificate) a company begins to take Safety seriously. However at this point it is an "add-on" with a lot of good intentions. Policies and manuals are written and a system is put in place – but little changes.

It's as if they gave a big party and no one came. Mintzberg's second C – **C**ompetence can be seen to be in play here. With help and some cases, trial and error and time this culture can move to the next level. Sadly, it's not uncommon for a culture to remain at this level as it looks good on paper but is not a true Safety culture until it reaches the next level.

3. Generative – Everyone is responsible and must do their part to ensure that all Safety risks are ALARP (As Low As Reasonably Practical)

- Makes Safety an integral part of everything the organization does
- Very mission focused
- Flexible organization
- Very performance driven
- Free information flow and new ideas are welcomed
- Uses information and employee intellect effectively
- Emphasis is more on achievement, than process
- Responds well to problems, not so well to processes
- Reform comes from all levels ***Tend to encourage the (Safety) messenger***



This level has everyone singing from the same Safety song sheet. Human error, responsible for most of an organization's accidents and costly incidents, is openly and fairly treated as learning opportunities to reduce error.

As I stated in the previous article, I believe that a Safety culture is achieved when:

√ Safety is treated seriously by the management

√ all believe that Safety does not have to come at the cost of productivity

√ Safety is an integral part of the way the company operates

√ all company employees are trained and encouraged to think and work Safely at all times

√ Safety goals are set and all work toward their achievement

It is my sincere hope that you work in such a culture as it is the only way we can continue to lower the accident rate. In our next article I'd like to discuss what will assist any organization in developing a Safety culture – a Safety Management System done right.

I would like to ask you to **please send in your score** to the 20 Safety culture questions in the last issue. Also please include your position in the company as Management, Maintenance, Support staff or other. Others can be pilots or even interested readers. All scores sent in will remain strictly anonymous but if I receive sufficient scores, I will compile them in a later article and we may have a rough idea as to where the majority of our aviation companies are on the never ending journey towards a true Safety Culture.

Thank you

My email is dupontg@system-safety.com

Staying Ahead of Change in the Workplace

The aviation industry like many other industries, and maybe even more than most, is changing at a rate that is hard to fathom, let alone trying to stay ahead of the change. We find this is especially true when it comes to dealing with people and understanding the differing needs of the generations in the workplace. There is a generation of experienced maintenance technician professionals that is aging out of the workforce over the next few years. There is a new generation already in the workforce with a whole different set of expectations and guiding motivations. Leaders, supervisors, and managers are feeling the pinch of trying to understand, manage, and motivate this new generation of workers while trying to meet increasing demands placed on them by the marketplace to get things done faster, cheaper, and better than ever before.

One of the challenges we are hearing from leadership and hiring managers is that the typical new job applicants are not as technically skilled as they were even 10 years ago. A&P school training is limited, and modern technology changes faster than it can be taught in the schools. It is more difficult to find professionals with the exact technical abilities for the job description. Even job descriptions for maintenance technicians are not what they were in the past.

Most organizations, whether they are a small maintenance shop or a large OEM or MRO, are tasked with doing more, faster, and with less resources than ever before. So, individuals and departments have a wider scope of job responsibilities within their typical work environment.

Hiring in the new environment

How do we hire and motivate our teams in this new environment? What should be the important questions to ask and things to look for to build and maintain a culture of service to each other and to our customers that will be competitive, safe, and a place that we can be proud of? The assumption we will make is that you already have an engaged and motivated team. This is an important pre-requisite to hiring and maintaining the best young technical professionals. Open communication, along with engaged and empowered team members that motivate and inspire each other is a necessary component to being able to hire new technical professionals … and be able to keep them.

The culture of your organization is something that new hires will need to assimilate into. How do you find people that are a good fit for your culture? There are some professional recruiting companies in the aviation industry (like API and JPI) that do a great job screening aviation professionals, so that is a good place to start. Hiring people for personality is more relevant than hiring for experience. If the person has the right attitude, there are ways to get them up to speed on the technical requirements of the job. If the person does not have the right attitude, no amount of training, coaching, or mentoring is going to make the person fit in and work out. There are many personality tests that are useful when hiring new team members. There are also questions and techniques that can be used to try to discover the attitude/personality of a person interviewing for the job at hand. Some people are very well skilled at interviewing. They can make themselves look very good in the initial interviewing process -- beware!

Ask situational questions

Ask the interviewee situational questions, where he/she has to describe circumstances that they dealt with to resolve a situation. This will give some insight into how they might react in stressful situations or situations that the job might require. Here are a few examples:

1. "Give me an example of when you took action when those around you were waiting for someone to tell them what to do."
2. "Describe a situation when you intervened to help recover a customer service issue."
3. "Tell me about a time when a customer was not happy with something you did and you turned the situation around."

These types of behavioral questions will tell you more about the person and how they would handle a situation.

One tool that we recommend using when trying to ascertain the type of person who is applying to serve in your company is simulation, or role-play. Simulators have long been used in aviation to train professionals on technical skills. Simulation is also a useful tool for working through people or company culture issues. Give a potential new hire a couple scenarios that have been past difficult situations in your work environment. Ask how they would deal with them. Here are a couple examples:

4. *You have recently been promoted to manager of maintenance services. Jerry, a good friend of yours, had also applied for the job. Jerry is well liked among his coworkers, and he is also very customer oriented. Now, you are Jerry's manager. Over the last month, Jerry has been coming to work late, and you have a feeling he has been creating a negative mood among others on your team. Jerry is a valuable team member, and he has a lot of influence with other coworkers. What would you do?*
5. *A customer/owner scheduled a flight prior to the aircraft going into inspection. There was an unexpected repair. The part was not in stock and needed to be ordered. This delayed the release from maintenance, and the aircraft was not available for the flight. The owner demanded to go as scheduled and advised maintenance to finish the repair after her flight. What would you do?*

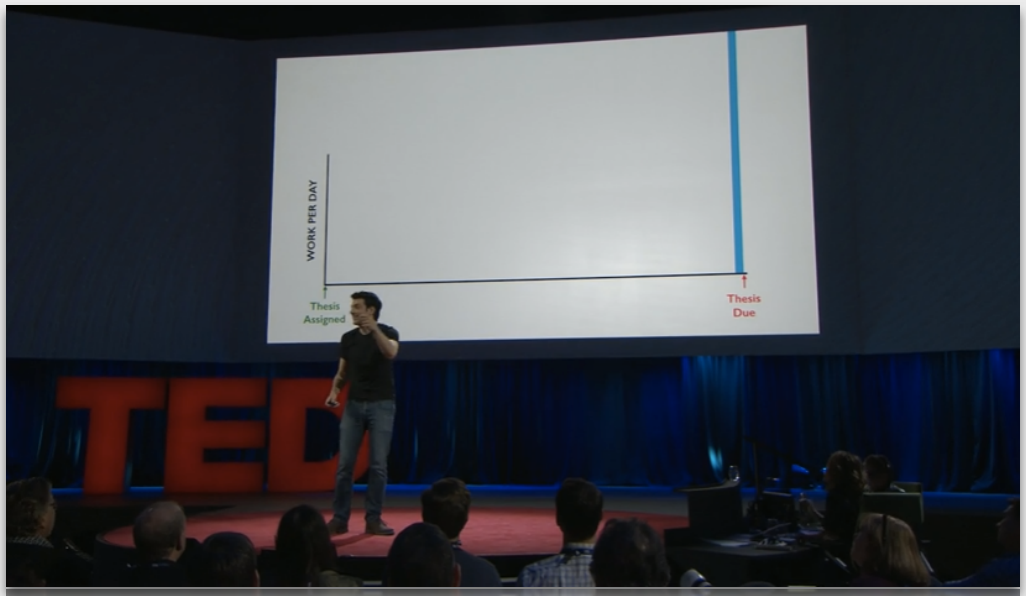
By giving the potential new hire some real-life scenarios, it gives you a glimpse into what his/her thought process and moral compass are when making decisions. Does it fit with your organizational culture? Take your time in deciding even when under pressure to hire quickly.

The people that you bring onto your team are vital to the continuation of the organization and the well-being of the team. If you have a good thing going on -- you need to guard it with a vengeance. Training young maintenance technicians to troubleshoot on a specific type of equipment will be easier when you have the type of attitude/personality that fits your organization's culture.

Ted Talks - Ideas Worth Sharing

Inside the mind of a master procrastinator

Tim Urban knows that procrastination doesn't make sense, but he's never been able to shake his habit of waiting until the last minute to get things done. In this hilarious and insightful talk, Urban takes us on a journey through YouTube binges, Wikipedia rabbit holes and bouts of staring out the window — and encourages us to think harder about what we're really procrastinating on, before we run out of time.



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