Why Innovate?

Harry (Zan) Hornbuckle  
C & HHC/3-15 IN, 3ID

I think innovation has three parts we should consider. The first part is how we change our training systems from basic through officer training. The Asymmetric Warfare Group has started some interesting programs in basic [training] that break from the Industrial Age system of mass training and focus on teaching understanding and problem solving. In the Maneuver Captains’ Career Course we have broken from “what-to-think” training to “how-to-think” training. All of this focuses on problem solving—being able to anticipate future conditions and make adjustments to set your unit up for success. The second part of innovation, which we are seeing a lot of, deals with systems. These range from force protection, electronic warfare, surveillance and reconnaissance to weapon systems. The challenge with this part is to understand new systems’ capabilities and limitations and how best to employ them in support of the operation. The third part of innovation deals with how we adapt to defeat the enemy with either lethal or nonlethal means. An understanding of enemy patterns and vulnerabilities allows us to adapt faster than he can. This may be the decisive use of innovation. When we consider the time it takes to change our training systems and field new equipment to counter a new enemy tactic, we will most often be behind the enemy's decision cycle. We avoid setting our own patterns to limit our exposure to his actions. In the end, we use innovation to get ahead of the enemy’s decision cycle, to gain and maintain the initiative.

Marshall Tway  
D/1-1 CAV, 1 AD; HHC/2-501 AVN, 1 AD

I would pose one devil’s advocate question on innovation versus reintroduction: If nobody in the organization remembers something, isn’t it new to the organization? Through an aggressive system of AARs, we continued to develop our use of tactics, techniques and procedures (TTPs) throughout our combat deployment. We would alter things like altitude and airspeed depending on the terrain and illumination levels. Is this really innovation? I would answer that it is not—it is the continuing evolution of TTPs.

Tom Handy  
A/163rd MI BN, 504th MI BDE; C/303 MI BN, 504th BfSB, III Corps

If today’s enemy can keep innovating as he has done, we must do the same in order to stay ahead. For a commander to innovate, he has to know his own Soldiers. What are their strengths and weaknesses? If this is known prior to deployment, the commander will be that much more successful downrange. In my position, my HUMINT company will be scattered on the battlefield. All of my team leaders will have their own issues to deal with and some will work directly for a maneuver commander. They have to be resourceful and knowledgeable to support the various commands they will support. The guidance I provide starts here at home station. The guidance from my company leadership will only prepare the team leaders to be innovative on the battlefield. We place our trust in 18- to 23-year-olds to work above their pay grade, to be responsible and continue to set the standard for all to see. To be innovative...
in combat, it must first start at home. I have laid out guidance to my LTs and PSGs and am always surprised by the result.

Matt Hardman
B/2-505 PIR, 82nd ABN DIV

The most innovative leaders I have worked with or for in the Army have been those who had the best grounding and understanding of doctrine. You cannot start deviating and experimenting unless you know the risk versus reward of what you are trying to do. LTs in Iraq and Afghanistan are now going to be asked to plan and execute missions in under 30 minutes (QRF or perishable actionable intelligence). The only way to do that is by having a professional, deep understanding of the doctrine and tactics. You have to have detailed contingency plans that are very well rehearsed. There has to be a culture of preparation. Men and equipment are not prepared right before the mission; they are prepared as soon as you get back from the last mission. Training and rehearsals are constant and ongoing. The skills of leaders and Soldiers, squads and platoons will atrophy if they are not constantly preparing. I took command from a really great officer who had built this culture in the company, and I tried to sustain it.

There is no training manual or doctrine that tells you how to pry a wounded Soldier out of a crushed Humvee, but there was a bad accident in my sector that trapped a Soldier in his vehicle in a very bad neighborhood. One of my platoons was out conducting an area reconnaissance, and I tasked them to respond. How did they respond? They fell back on the familiar: their training and rehearsals. First and foremost, establish security! Once you do that, things are much, much easier. They established a secure area, and then they were able to adapt and solve the problem. They ended up pulling the Humvee apart and evacuating the Soldier using the company’s well-rehearsed plan. When we start deviating from our doctrine, plans and SOPs without thorough thought, training and rehearsals, we do so at great peril.

Innovation in Action
Greg Hembree
B/76th STB, 76th IBCT, INARNG

I am focusing on my effects-based efforts that include rebuilding the social climate and, in doing so, setting conditions for continued and improved diplomacy between the United States and Iraq. I have begun a campaign that focuses on preparing Iraqi youth, the future leaders of this nation, so that we can better partner with them in the future to continue peaceful relations.

Contributing specifically to the Green Zone Council of the Iraqi Boy Scout Program is my idea of a nonlethal effects attempt to kill the insurgents where they live—in the hearts and minds of some of the host-nation locals. It isn’t sexy like door-kicking or conducting a snatch-and-grab, but it builds rapport with our local neighbors and increases the partnership with the Iraqi community. Second-order effects are a boost in the local economic and social climate. Third-order effects are building the Iraqi leaders of the future. These are the sheiks, businessmen and diplomats that military and U.S. envoys will negotiate and partner with for a peaceful relationship between the United States and Iraq. Some people don’t understand why I am doing this—on my own time, as a volunteer service project—but my years in the Special Forces community have taught me some good lessons about effects-based
operations rather than casualty-count-based operations. My assessment is that my project is absolutely congruent and supporting to Gen. Petraeus’ COIN guidance and to the strategic and tactical objectives here in Iraq.

**Dustin Dew**
1/108th MP CO, 18th MP BDE

Another ingenious idea our Soldiers developed was an L-shaped bracket screwed through the door by the battle lock bolt. Soldiers could attach a quick recovery chain to the bracket from another vehicle and yank the door clean off. This idea was devised because of the many Soldier deaths caused by fires in Humvees. Our Soldiers had the comfort of knowing that everyone would do whatever it would take to get them out.

**Jonathan Silk**
C/1-72 AR, 2 ID

I was a Scout Platoon Leader with Killer Troop 3/2 ACR. I was attached to a tank company, B Co 2/37 Armor “Battlecat,” while conducting operations in Kufah/Najaf during Operation Iron Saber in April–July 2004. My section leaders and I came up with an effective way to use the M203 grenade launcher to deny the enemy the use of the alleyways as a covered position. Mahdi Militia forces would use alleyways, which can be classified as urban dead space, and side streets a few hundred meters from the platoon’s position to mass and maneuver to a firing position to engage us. On today’s urban battlefield in a COIN environment, rules of engagement issues can either delay or prevent indirect fire support. The M203’s capability to engage and destroy enemy forces using urban terrain as cover and concealment makes it an effective alternative when indirect fire is unavailable. The M203’s 40 mm round minimizes collateral damage, which is important in the urban COIN fight when enemy forces are in close proximity to innocent civilians.

Once our platoon established a dominant position, the grenadiers fired weapons to engage enemy forces who were massing in dead space where the platoon’s direct fire weapons could not engage. The grenadiers can fire marking rounds at the entrances of side streets or alleyways, which can be adjusted by gun trucks on the ground or from a dismounted team observing the same area. Once the marking round is on line with the alleyway, the grenadier then fires into the alleyway. The incoming 40 mm rounds detonated in the alleyway or on the sides of the alleyway, killing or wounding enemy forces and denying that terrain as a covered position. The enemy had the choice either to stay in the alley and absorb the 40 mm indirect fire or maneuver to another position. When the enemy attempted to maneuver out of the alleyway or side street to escape the 40 mm fire, the gun trucks covering those areas engaged and destroyed them.

**Peter Stambersky**
D/701th MSB, 10th MTN DIV (LI)

A couple of things I did to innovate on the CSS side of the house for logistics in Afghanistan was to bring some techniques back into use from previous wars. One was the use of donkeys for resupply to observation posts when air assets were unavailable. Of course, the bigger the donkey, the greater the load it could carry. When we couldn’t find enough donkeys, had no road to where we were going and had no air lined up, we used local modern-day Sherpas with Army-issue duffle bags, zip-tied to prevent pilfering with a strip of a VS-17 panel attached to help identify friend from foe. We would escort this platoon of Sherpas, loaded into HiLux pickup trucks, to a drop point or logistics release point for the supported unit. They were usually guided in by the supported unit or attached Afghan National Army troops.

Some other tricks to help support logistics in the rugged terrain of Afghanistan included:

- Using jingle trucks (small flatbed trucks driven by local nationals in Afghanistan) to transport up to 3,500-gallon blivets to use as a forward refuel point for mounted forces.
- Using well-labeled “tri-walls” or “multipack” boxes in our sling load nets to maximize loads and facilitate downloading on the receiving end.
- Using HiLuxes and jingle trucks for transport of Class I and IV. This increases my load capacity versus the Humvee or MTV and frees up Soldiers to drive the more maneuverable Humvees and provide security to the LNs if needed.
- Using local-national cranes and jingle trucks to recover and transport vehicles that have been disabled or stuck.
■ Hiring locals to build a raft to ferry supplies across a washed-out road.
■ Hiring locals to provide KP support, trash removal and laundry services. (Be sure to hire from all of the surrounding villages so as not to upset one by excluding them.)
■ Hiring local-national mechanics to work on ANA and Security Force trucks.

Eric Balough
HHC/1-16 IN, 1/1 ID

The advisory missions in Iraq and Afghanistan both require an incredible amount of innovation and adaptation in training, logistics and mission execution to be successful and survive. Here are a few personal examples.

■ None of us were experts on Warsaw Pact weapons, so we enlisted the aid of Romanian SF to help us run zero and qualification ranges for our ANA. We also used U.S. SF as subject matter experts for reflexive fire ranges, combat lifesaver classes and other training.
■ When we found opium during checkpoint operations, we would burn it on the spot to prevent being accused of stealing or being pressured to turn it over to the ANA or National Police—so that they could sell it.
■ We would modify our trucks to carry extra ammo, food and fuel to cope with the poor supply situation. We built our turret racks so that gunners were able to access ammunition more readily and still did not have to compromise their armor protection.
■ One of my NCOs created a pictorial PMCS manual for our ANA since their literacy rate hinders publishing manuals with words.

Mike Schmidt
C/3-71 CAV, 10th MTN DIV (LI)

We had a hard time getting resupply pushed forward to our patrols. The fastest and most flexible way of getting these supplies forward was by helicopter. Unfortunately, our first attempts used a freefall method of delivery, and the aircraft could rarely get low enough to ensure the supplies survived when they hit the ground. We were only able to utilize 30–50 percent of the supplies delivered using this method. With blade time at a premium, we had to find a way to get those supplies to the ground.

We developed a refined method that allowed us to lower duffle/kit bags of supplies down to the ground from a hovering aircraft. We rigged an anchor point in the aircraft that allowed us to use a belay device to control the descent of the supplies, which were tied off to a kern-mantle rope. We backstacked the rope into a bag to keep it from getting tangled with the aircraft. (You can reference FM 3-97.61 or any civilian mountaineering text for more technical data.)

Thanks to Jeff O’Dell, we got this delivery technique signed off by our supporting aviators and employed it with great success in support of our last mission. Look Jeff up for more info on the system he developed.

Cautions About Innovation at the Company Level

Mike Bonura
A/4-7 CAV, 2 ID

There seems to be a fundamental problem with the way we as an Army describe innovative leadership. Leaders at all levels must adapt their doctrine and training to the changing situation, enemy and terrain they find themselves deployed or operating in. That is less innovative and more the
Gary Spivey
814th MP CO; HHC8th MP MP BDE; HHC US Disciplinary Barracks

Talking about company leadership and innovation is a bit curious to me. As I look back over my three company commands, it is interesting to see that my greatest innovations involved leading the company in a return to executing base doctrine. With that in mind, I think the appropriate type of innovation is in the application of doctrine in an efficient and effective manner (sometimes referred to as the art of war, as opposed to the science of war). I would submit that the more effective company teams are those that execute doctrine (the science part) with precision, flare and gusto to achieve clear measures of effectiveness.

In my mind, innovation implies deviation from established doctrine—while aiming for positive results. I think a theme that has emerged is that in order to deviate/innovate from established doctrine you first are required to have a baseline understanding of doctrine (normally branch specific at the company level). We cannot lose sight of the fact that our freedom in decentralized execution implies a certain responsibility to our boss to execute his intent, not our own. I know a lot of guys who think innovation means making something up from scratch. Exactly how many of us created something brand-new, never-tried-before while we were in command? Of course I thought I had, every time we did something that had results that exceeded expectations; most of the time, however, my bright shiny idea had already been written about and tried before.

Let’s face it, as guys with anywhere from two to four years experience in practicing the trade, exactly how innovative do we think we can be—myself included, in retrospect? Instead of spending time and energy trying to be “original,” how about learning the trade and executing the commander’s intent in the best manner you can? I am not knocking innovation, but as a captain, that role is about developing our ability to apply the science of warfare to become an artist in the application.

The commanders I worked around in Iraq were mostly excellent. The best ones executed operations based on doctrine, with deviance driven by METT-TC. Doctrine provides a common frame of reference. I submit that before you can think outside the box, you really must be able to define the box.

John Hollein
4th CM CO; HHD, 61st Multifunctional Medical Battalion

To borrow from another oath, perhaps the first rule of the innovative mind-set should be: First, do no harm. I can think of many scenarios that would meet a definition of innovative mind-set that could result in courts-martial, especially when the “thinking deeply” part is done by leaders and the worst possible outcome ensues because of the focus on mission and Soldiers while ignoring the rest of METT-TC and the strategic implications of what you’re doing. I’m intrigued by how many of the innovations above are fabrications (as in to construct or create from materials on hand). Many of the solutions discussed are along the lines of “let’s make this better.”
rather than “let’s find a different way.” The danger with innovation in junior or inexperienced leaders is a tendency to toss out everything, including doctrine, rather than to use the tactical patience to discover what is working and build upon it.

Greg Hembree  
B/76th STB, 76th IBCT, INARNG

I think that innovation is a double-edged sword. While I absolutely believe that there is a need to think “outside the box” and use your creativity, I have also told my peers and subordinates that sometimes you have to get “back inside the box” so that you can keep perspective.

I am from Indiana, where Bobby Knight made so many accomplishments as a basketball coach for the Indiana University team. More often than not, when reporters would interview Mr. Knight and ask what his secret to success is, he would reply with something along the lines of sticking to the fundamentals. His claim to fame and his method of successful coaching was to focus on the basics and build a strong foundation in the fundamentals. Everything else will happen naturally. His success rate provides credible evidence that this is a sound course of action.

For us, doctrine provides our foundation for Army or military fundamentals. Is there room for deviation and creativity? Yes, there is room for creativity, which is where innovation is born. The Special Forces community proves time and time again that being creative and continuing to punch forward is a successful way to overcome the enemy and achieve the objective. Is there room for a platoon leader to be innovative? Maybe the 2LT and 1LT demographic is still in the learning phase of officerhip and should stick to conquering the basics and fundamentals of our doctrine. Or maybe their level of innovation is simply limited in order to control the “blast radius” in the event that their creativity is disastrous. Is the rank of captain or the position of company commander the level at which we can wield innovation more freely? I don’t know. I have seen even LTCs try to think outside the box who can’t achieve success.

Perhaps it just takes the right person at the right time in the right place to apply the right innovation to achieve success. Maybe rank is immaterial. Perhaps doctrine is the boundary, or the left and right limits, that provides us all with a sanity check. The further away you get from doctrine, the more risk you assume and the “crazier” your innovation may be.

As you can see, the question of innovation at the company level is by no means settled. Do you have strong feelings about how or if company-level leaders should innovate? Come to cc.army.mil and join the conversation!