SOCIAL MEDIA

Leveraging Social Media to Increase Collaboration and Innovation Across the MCISRE

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This paper reviews the use of social media tools and identifies best practices that have potential applications to increase collaboration and innovation within the Marine Corps Intelligence Surveillance and Reconnaissance Enterprise (MCISRE). This begins by examining some of the popular social media available on the World Wide Web (WWW) and compares the features of the popular social media sites to social media applications available on the secret level Secure Internet Protocol Router Internet (SIPRNet), and the top-secret level Joint Worldwide Intelligence Communications System (JWICS).

Social Media – defined

Social media is a term that describes the set of features that allow individual users to create and post commentary or information (often-called content) on social media websites (Boyd & Ellison, 2007). Unlike traditional internet media that requires a web developer, social media users have direct control over the content they wish to share with friends, family, or groups, while following the content that other site users post. Each social media website will have different names and different features, but the common characteristic is user control over the content.

Social Media on the Internet

Facebook provides multiple features that allow users to follow each other and post a variety of content that ranges from instant text chats, messages similar to e-mail, to pictures and content from other users. Facebook has a global reach with over a billion active users (Fowler, 2012). Facebook's popularity is due to the functionality and something called the network effect, a term that describes a condition when the "utility that a subscriber derives from a communications service increases as others join the system (Rohlfs, 1974, p. 16)." MCISRE leadership should consider the network effect when selecting tools and applications for use within the enterprise.

Twitter is a social media site that allows users to post short messages called "Tweets," up to a maximum of 140 characters long. This short message format is tailored for mobile phone applications but it benefits computer users who have limited bandwidth connections to the Internet. As new intelligence products are developed and posted, MCIA or MEF Intelligence Centers (MICs) can use a Twitter-like application to send short messages that alert consumers to the new content.

Wikipedia is a free, online, information-sharing encyclopedia that has grown to a site containing 4,000,000 articles in English (Wikipedia, 2013), compared to the 65,000 articles in the last print version of the Encyclopedia Britannica (Encyclopaedia Britannica, 2010). The intelligence community has already recognized the power of Wikipedia and has leveraged this model in the form of Intellipedia.

Social Media and the Future Customer/Employee

Molly Rauzi (Oct 2012) noted that by 2025, seventy-five percent of the work force will be the generation of people born after 1980, the Millennial Generation. According to one study, eighty-five percent of the millennial generation is active on social media websites (Pew Research Center, 2010). With such a large segment of the future workforce using social media, the MCISRE needs to adapt to social media as a means to disseminate intelligence and as a communications tool, because its future customers and employees are already used to the advantages social media provides.

Advantages of Social Media

The McKinsey and company study by Manyika, Chui, and Sarrazin, (2012) sees social media as a more efficient way of communicating and collaborating, because social media exposes the information that otherwise lies hidden within email and personal files. For example, information exchanges between any two or more members of a social media site become shared content and social media provide a mechanism for hosting searchable content by every member of a community. New information provides opportunities to update the content on a continuous basis and the older information provides a historical perspective.

Social Media use by American Industry

Siemens' Urgent Request tool facilitates problem solving by allowing users to find subject matter experts (SMEs) within the Siemens corporate enterprise (Wiener, et al. 2012). When a user needs to draw on Siemens' corporate expertise, the user selects a topic category and sends the request to the groups that will most likely have the expertise to answer the question. The tool determines who actually will receive the request based on each user's group affiliations and their tagged content within Siemens internal social networking posts. Lastly, before a user can send an urgent request, they select an estimated business impact ranging from 1,000 to 1,000,000 Euros. The sliding scale helps determine the size of the target audience for an urgent request, the greater the impact the wider the distribution. MCSIRE could consider a similar tool to aid in answering intelligence questions.

Government use of Social Media

In May 2011 the Centers for Disease Control's Public Health Matters posted a blog based on a "tongue-in-cheek" set of tips based on how citizens should respond to a "zombie apocalypse" (CDC, 2012). This social media web log, or blog, serves as an example of how agencies can use creative approaches to drive conversations, encourage the use of social media and attract visitors to their websites. The CDC's Zombie post received over ten times the normal traffic for the CDC blog site. Within the MCISRE, this type of humor may be a way to encourage the use of social media, bring in visitors and lead those visitors to other intelligence products.

Much like the MCISRE, the TSA has a large geographically dispersed workforce. Communicating and sharing ideas across the organization can be difficult; this is especially true for members of the organization who are located far from the senior leadership. The TSA's Idea Factory represents a best practice that the MCISRE, if not the broader intelligence community could leverage to promote collaboration across the enterprise. TSA developed the Idea Factory, as a website for its employees to collaborate with the entire TSA community without any filters (TSA, 2012). Within the first four years, the Idea Factory generated 75 programs or initiatives. TSA claims that an additional benefit of the Idea Factory is that engaged employees have higher morale because they have a voice in the organization with a meaningful vehicle to propose ideas and provide feedback (TSA, 2011).

Social Media Use in the Intelligence Community

The intelligence community (IC) has developed social media tools that have the ability to create a network of analysts that can offer solutions to the problems of the present and the future. The MCISRE can take full advantage of the tools already created in order to develop a stronger, more diverse, analytic team and provide a valuable service to the war fighter. The tools already created for the intelligence

community mirror the social media tools available to the public. These tools include A-Space, eChirp, wikis, chat rooms, and streaming video (see Table 1). The suite of tools can create a network of analysts within the MCISRE and the broader IC to support the war fighter.

Michael Wertheimer, assistant deputy director of national intelligence for analysis, described Aspace as "...every bit Facebook and YouTube for spies, but it's much, much more (Shaughnessy, 2008)". A-Space, like Facebook, allows the user to create a diverse network of "friends" from across the IC. The MCISRE is often asked to do more with less, so a diverse network of colleagues available across the IC can be an instant force multiplier. For example, if asked about chemical weapons reaching out via Aspace could help find the right analyst with the required expertise to answer the question. It also provides for an expanded network of people to collaborate on analytic problems and allow for the discussion of alternative analytic topics that may not be fully developed. Finally, A-space can be used to distribute analytic products to a larger audience than just the Marine Corps.

eChirp is very similar to Twitter. Just like news organizations use Twitter to break stories; in the MCISRE, eChirp could be used to distribute warnings, intelligence products, or to broadcast a potential question that the group of followers could help answer. Again, the group of followers does not have to be limited to Marine Corps Intelligence or just analysts. eChirp could help the MCISRE switch from a pull to a push method of dissemination for products. Every new product could be pushed via a link to every Marine unit or IC element that the product was written for via the group of followers. This would require a change in the way business is currently done in which almost everything seems to be a pull by the customer from a website. There is no reason to get rid of the pull method, but adding a push method for dissemination is beneficial for the MCISRE customers.

Wikis have the potential to improve and replace the traditional reference type products produced by the IC and the MCISRE. Wikis can be living documents and they are not limited to one author or one agency to update them. As living documents, analysts can update the wiki immediately with the newest

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information. Further, through the meta-data associated with wikis, each change to the information is traceable to the analyst who made the change. A team of analysts sponsored by the Office of the Director of National Intelligence (ODNI) and State Department's Bureau of Intelligence and Research (INR), looked at changing the outputs of intelligence products and concluded that "...intelligence, especially intelligence analysis, cannot truly be transformed until its practitioners have reshaped the way they think of their products (2011 IC Associate Teams Program, 2012, p. 1)." Instead of current model that uses static intelligence products as reference documents, wiki pages could replace the static reference document. The potential benefits to the warfighter or policy maker customer include reference documents that are more dynamic and potentially created by a broader pool of analysts.

Chat rooms have been in use with the IC and the DOD for many years. However, there are areas in the IC, to include MCIA, that still have limited access to chat rooms. Limited access to chat rooms can make collaboration more difficult. It also hinders the ability to stay in real time contact with war fighters forward or other analysts across the world. This ability to collaborate instantly is important in times of crisis or active combat operations, but collaboration is always important and chat rooms can improve collaboration. The use of chat in the future is going to be even more important as the future generation of analysts, war fighters, and policy makers will be used to instant communication from sending text messages etc. Further chat rooms are essential in order to use streaming video to its fullest potential.

Real time video has transformed the battlefield. Teams of analysts hundreds if not thousands of miles away from the battlefield have become force multipliers for the combat teams on the ground. In 2010, the New York Times described the use of streaming video and chat rooms, and how they were effective during the fighting in Afghanistan. A team of Air Force analysts thousands of miles away interacted daily with Marine combat patrols in Afghanistan. The Air Force analysts were able to provide real time data that saved the lives of Marines. This technology can be incorporated into the MCISRE immediately and act as a significant force multiplier (Drew, 2010). Analysts forward can shift their focus from watching video feeds and shift that responsibility to analysts in the rear. In order for this to be

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effective, there would have to be a significant lash up between the forward element and the rear element exploiting the data.

A-space, eChirp, wikis, chat rooms and streaming video have been discussed individually, but all of these could work in conjunction with one another. Imagine an analyst is watching streaming video and noticed something out of the ordinary. That analyst asks a question in a chat room and then immediately sends out an eChirp to his group of followers asking for help. He also reaches out to his group of friends on A-Space looking for answers. The analyst shares the streaming video with others, and it is possible that this process is replicated with analysts throughout the community. The social media tools allow for a broader, more diverse group of analysts to work against a specific topic. This information then can be relayed back to the battlefield in real time to the war fighters who needed it, and then whatever answer comes from the video could be instantly incorporated into a wiki page with the new information allowing future warfighters, policy makers, and analysts to the benefit of the group's work.

The social media tools A-space, eChirp, wikis, chat rooms and streaming video already exist. They have the ability to incorporate a diverse set of analysts etc into solving the nation's problems. Some of these tools have already proven themselves as force multipliers. Other tools have not been fully incorporated into the IC or the MCISRE. If the MCISRE is willing to rethink the definition of an intelligence product, wikis are a tool that has the potential to make an immediate impact to the MCISRE. The use of social media tools will allow the MCISRE to take advantage of the broader pool of IC analysts and will allow MCISRE analysts to work more closely together.

Social Media Applications and the Intelligence Community Equivalents			
Site Name	Content	SIPRNet	JWICS
FaceBook	Musings, news, links, instant messages, messages and mini-blogs	N/A	A-Space
Twitter	Short messages up to 140 Characters on a variety of topics	eChirp	eChrip
Wikipedia	User generated encyclopedic source.	Intellipedia	Intellipedia
Govt. & Business			
TSA Idea Factory	Online Suggestion Box	N/A	N/A
Expert Finder	SIEMENS social media tool for finding SMEs based on topic, impact, and social networking keywords	N/A	N/A

Recommendations for the Application of Social Media in MCISRE

 Table 1 Comparison of Social Media on Unclassified and Classified Networks

 Advancing the use of social media

Social media has made huge strides in the intelligence community over the last several years, especially in regards to analyst collaboration, via sites such as eChirp, A-Space, and chat rooms. These tools have been used to bring analysts together to build intelligence products. Getting instant feedback from your analyst peers is essential, but if the final product does not reach the intended audience or others who can effectively use the information the effort is lost.

As the DNI's Information Sharing Strategy states, the IC, including the MCISRE, has a "responsibility to provide" intelligence to the warfighter (ODNI, 2008, p. 9). Today the IC uses email with attachments, manually transfers files between the various networks, and posts products on disparate web sites in the hope that customers can find the products when they need them. Warfighters engaged in combat or support operations have been hampered by trying to determine where to look for relevant information and being overwhelmed by the volume of data. Tools such as Palantir, TAC and M3 help analysts parse through the enormous amount of data; however, data discovery is still a challenging task. The good news is we have been working with the leaders within the IC, and there is an effort underway to

centralize information and get away from stove piping. Social media is one of the tools in this process. Some of the keys points will be migrating users away from hoarding static files and instead provide them with their own websites, i.e. A-Space to improve information sharing between users and align with the communications modes that the IC's youngest employees use today. If a user moves to another job, the page will stay active or migrated to another user within the group to allow for continuity of information during turnover. The IC is also working on protecting data by user Identity and Access Management (IDAM) instead of compartmenting data on different classified networks; in the future analysts and consumers will use a single information-sharing environments outlined in the DNI's strategic keystones (ODNI, 2008). Implementing IDAM across the IC will take a considerable amount of time but the result will improve the dissemination and advertising of intelligence.

Challenges and Risks Associated with Social Media

The McKinsey and company study by Manyika, Chui, & Sarrazin (2012), notes that a successful a social media strategy is contingent upon the degree to which employees participate in using the social media applications. The study also indicates that a key to improving knowledge worker productivity is ensuring that all employees across the organization participate in the use of social media, by making social media participation part of the daily workflow. Another necessity for encouraging participation is ensuring there is an environment of openness, information sharing, and trust. McKinsey and Co. note that leaders must take the lead and serve as role models for using the technologies to drive value, identify success stories, and translate the successes to the rest of the enterprise.

Corporate enterprises are concerned with the loss of proprietary information, spilling information regarding the features of a new product or event the timing of the product release. Similarly, the MCISRE will likely encounter situations where analysts exposed to information available on JWICS spill the information on to the SIPRNet as part of analytical conversations. With the post 9/11 IC emphasis on providing information to the warfighter, the issue is one of balancing the risk of spillage by training analysts to mitigate that risk in order to support the warfighter.

As the name implies, social media provides a forum for users to engage in social communications that may not necessarily contribute to the enterprise production requirements or facilitate the exchange of relevant information. However, the exchanges may contribute to increases in network ties between users, thus increasing the level of trust within community members. Leaders have to encourage and monitor to ensure there is a balance between the social and work related aspects of social media use.

Conclusions

The MCISRE has access to a sufficient number of social media tools via JWICS and SIPRNet. These tools offer the advantage of having an established user base and existing IC funding lines. Since the network effect is critical to social networking success, we recommend that the MCISRE focus on leveraging the social networking infrastructure rather than to build its own. Many of our users are limited only to SIPRNet and many of the social media tools only exist on JWICs, so there may be opportunities to push toward SIPRNet implementations of A-Space and e-Chirp.

Creating the critical mass with respect to social networking will take time and leadership. The MCISRE can expect to see younger employees and Marines embrace social media technology faster than older workers. Leaders can encourage all employees to make social media networking an important part of their daily routine. Eventually, social media use can become a habit; leaders can speed the process by incentivizing with metrics and creating creative social media sites that encourage members of the MCISRE to adopt and practice social networking.

Social media blogs, even professional ones, will reflect opinions and unfinished intelligence. There is a chance that customers will receive erroneous information because the need for timely information supersedes perfect knowledge that arrives after the "needed by" date. Balancing the risk between speed and accuracy is critical, and customers will need to understand the difference.

Social media may change our view of an intelligence product, the combination of traditional reporting sources, and blogs may lead to customers having their information needs answered with existing finished intelligence products and opinions derived from analyst and subject matter expert chat sessions.

The goal of a single unified network is not yet reality, and most of the MCISRE customers use the SIPRNet. Given that MCISRE members have access to multiple classified networks and multiple sources of intelligence, it is likely that some information will cross information system domains, leading to unauthorized disclosures of sensitive information in much the same way corporate blogs facilitate accidental disclosure of proprietary information. The MCISRE will needs to manage that risk and identify methods for mitigating these spills.

Social Media can increase productivity by facilitating the exchange of information across a very large enterprise, but as the name entails it is social in nature. Managing employee engagement in productive social networking endeavors can be a challenge, and leaders will have to be imaginative and creative in order to maximize the media's utility, but social media is essential for the future of the MCISRE and the benefits far outweigh the challenges.

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