Rumour research can douse digital wildfires

Work on how rumours arise and spread could help to dampen the effects of damaging misinformation circulating on the Internet, says **Nicholas DiFonzo**.

The metaphor 'digital wildfire' — one of numerous threats to society identified this week by the World Economic Forum in its *Global Risks* report — is well chosen. The image highlights the risks of the rapid spread of uncontrollable and destructive information — risks that are made possible by an ever-growing worldwide web of communication channels.

Many digital wildfires start as rumours, and social psychologists have long studied how rumours spread. The results of this research can therefore help in the prevention of and response to digital wildfires.

Why is this important? A digital wildfire ignited by a humorous complaint about United Airlines posted on YouTube by musician Dave Carroll saw the company's stock drop by 10%. A false Internet rumour that Syrian President Bashar al-Assad had been killed caused oil prices to rise. These are not trivial matters.

Research on rumour has come up with four concepts that may be applicable to digital wildfires: motivation, situation, narrative context and trust.

The spreading of rumours is an act of goal-oriented communication, often motivated by a desire to find out whether they are true. Other common motives relate to the sender–receiver relationship: to please or entertain the receiver and to make the receiver like or respect the sender. Self-oriented aims include: fulfilment of the sender's wishes; the boosting of self-esteem (or defence against threats to one's sense of self, cherished values or group identity); the exacting of revenge; and the achievement of a strategic goal (as with propaganda).

Situation matters, too. Just as forests are especially vulnerable to fire during drought, so too some situations make digital networks susceptible to wildfires. Ambiguity and threats to assets, both tangible (life, health or wealth) and psychological (group honour or cherished values) drive fact-finding rumours. Situations of conflict or rivalry produce strong defensive sentiments that welcome negative rumours about a rival group and positive rumours about our own. Perceived injustice often prompts people to take revenge.

Rumours reflect and resonate with larger cultural, historical and ideological narrative contexts, which render the claims more plausible and understandable to some groups than others. A YouTube trailer that defamed the Prophet Muhammad as a murderer, womanizer, bisexual and paedophile resonated with the widespread Islamic narrative of Westerners as desecrating, condescending and shameless barbarians who derogate the sacred and threaten moral order; violent reactions to it throughout the Muslim world cannot be understood without taking account of this context.

The most powerful ingredient, however, could be trust. Greater trust dampens perceptions of threat, makes negative rumours less believable and enhances the effectiveness of rumour refutation or response. Research has shown that, under conditions of interdependence and equal status, increased contact with members of rival groups decreases negative stereotyping and increases trust.

But in the digital world, rival groups tend to have little contact with each other. Recruiting members from opposing factions to projects with shared goals may therefore help to ease these tensions. In my own laboratory, when groups of strong Republicans and Democrats communicated online to accomplish a task, fewer believed polarizing rumours such as "Democrats abuse drugs" and "Republicans are racist".

These strands of rumour psychology can help us to understand digital wildfires. Why did Carroll's YouTube complaint that United Airlines broke his US$3,500 guitar, then refused to pay for repairs go viral? First, Carroll is a professional singer and his video was clever, humorous and entertaining; passing it along to friends and co-workers enhanced sender–receiver friendships.

> GREATER **TRUST** DAMPENS PERCEPTIONS OF **THREAT.**

Second, he tapped into a wellspring of distrust: within two weeks he received 10,000 e-mails from people asking for help with other customer-service problems. Anyone who has ever seen baggage lost or damaged can understand how this wildfire was fuelled by a widespread sense of powerlessness, frustration and dissatisfaction with an ever-more-Spartan post-9/11 airline industry. It drew on an implicit cultural narrative of David versus Corporate Goliath, and offered a hard-to-resist opportunity to exact revenge.

But United's response — which included reimbursement offers and a manager's apology — failed to stem the epidemic. More potent medicine was needed. The company could have, for example, come up with a country-music style video in which its president offered a no-excuse apology and announced measures to revamp the complaint department and to ensure safe baggage handling. Such a strategy would have removed revenge motivation (through gestures of justice and respect) and defused the situation (frustrations about baggage safety). It would also have conveyed benign intent (trust) and invoked the common narrative of apology–restitution–forgiveness. It might even have been entertaining to pass along.

Virgin Atlantic responded much more appropriately to a complaint about in-flight food that was starting to spread widely. The airline's owner immediately phoned the passenger to apologize and offered him the opportunity to assist in the airline's food selection. Virgin dampened the revenge motive by offering a high-quality public apology and restitution, and gave power to the offended party; because of the apparent humility and sincerity of these actions, Virgin did much to engender trust. The wildfire was doused. ■ SEE EDITORIAL P.134 AND FEATURE P.154

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