

# Social Networking on Web 2.0: From Emotional Intelligence to Cyber Emotional Intelligence

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## Summary

The aim of this article is twofold. First, we characterize the social interactions in the Web 2.0 and the forms of intelligence used by people in that context. Second, we propose cyber emotional intelligence as an alternative construct for the explanation of Internet-based social interactions. We stress the differences between the notion of emotional intelligence as developed by Salovey and Mayer and Cyber Emotional Intelligence that we propose. It appears that at each stage people do not have the same ability to express and manage their emotions.

## Keywords

emotional intelligence; social networks; Cyber Emotional Intelligence.

## 1. Introduction

Salovey and Mayer (1990) found that general intelligence accounts only for approximately 10-20% of life success. Emotional intelligence or social intelligence, defined as a set of social skills and capabilities, was proposed as an alternative construct that best explains real life success (Goleman, 1995; Bar-On, 1997; Salovey & Mayer, 1990). A plethora of literature was devoted to the explanation of how and where emotional intelligence explains the behaviour of individuals in a given social context (Goleman, 1995; Lafranchise, Lafourture, & Rousseau, 2007; Rhee & White, 2007; Ivcevic, Brackett, & Mayer, 2007) and how it contributes to their performance. Adler and Kwon, (2002) and Nahapiet and Ghoshal (1998) consider that emotional intelligence may help a person to build his or her social and cultural capital that explains life success.

Rapid technological changes associated with Web 2.0 seem to have a deep impact on social interactions and the ways in which individuals interact with each other and build their social capital. Inter- and intra-personal relationships have changed in this setting. The context, the content and the depth of expressing emotions have been modified. The success of new Internet services and applications is based upon their ability to share collective emotions and the way people express their views. Blogs, Wikis, Platforms (Youtube, Facebook, Twiter, Dailymotion...) or cyber worlds such as Second Life give support in expressing their feelings, creativity, and, more generally, their intelligence. The *Organisation for Economic Co-operation and Development* (OECD) indicates that more than 200 millions blogs existed in the world

in 2006. The number doubles each six months (OECD, 2007). Facebook has more than 200 millions active accounts. More than 20 million persons use Second Life regularly nowadays. People build relationships and participate in collective dynamics by sharing information, photos, videos, knowledge... Professional usages of such dynamics are well established nowadays.

One can conclude from these general trends that people express their emotions through social networks in the cyber space more and more often. New opportunities are arising both in the private and in the professional areas. Analyzing the impacts of this dynamic requires taking into account both inter and intra-personal effects of social networkings. Cyberspace is considered as a universe of expression of capabilities and competencies that are not possible in real life. People are able to exist either in visible or invisible forms, with their own attributes (names etc.), or create new personalities. Most of them mix some aspects from their real life with aspects from their desired life.

Starting from this point, every Internet user may express his or her intelligence through his or her digital identity. This identity is a co-product of technological constraints (such as platforms or cyber worlds) and implemented strategies.

One evident question related to those dynamics is about the relationship between intelligence, behaviour and attitudes of people in the cyber space. Do people acquire new competencies? Do they express their feelings differently in the cyber space than in real world? What kind of competencies and skills are needed in order to have successful strategies in Internet social networking?

The aim of this article is to discuss on the basis of these observations how emotional intelligence can be expressed in the cyber world. We shall try to characterize the skills needed for the expression of emotional intelligence in Internet-based social interactions, and stress the differences between those skills and the skills needed in the real world. By doing so, we propose a new construct – Cyber Emotional Intelligence – as an alternative construct. Our methodology consists of discussing the definition proposed by Salovey and Mayer (1990) and identifying what the changes are when we consider the expression of emotion in the Web 2.0.

The “interest” of our approach in social sciences is obvious.

On the one hand, it will be a question of understanding if Cyber Emotional Intelligence is considered as a real skill (competency) looked for by companies in order to develop their strategies in the Web 2.0. Different sectors require intensive use of the Internet. Cyber Emotional Intelligence could then be considered as a discriminating skill (i.e. competence) between individuals. More generally, it is advisable to understand how these skills can be developed and how companies can benefit from them.

On the other hand, in the field of marketing, while the customer relationship or the sale approach try to take into account the role and the impact of emotions and the emotional intelligence, the implementation of marketing strategies could consider Cyber Emotional Intelligence as an appropriate concept. This is particularly the case in terms of sales strategies requiring Internet or advertising on the Web. Finally, in leadership and in management, the geographical dispersion of firms requires the use of communication technologies from Web 2.0, in order to have a better coordination. In this context, leaders and managers with high emotional intelligence may express their feelings inappropriately or lose efficiency in communicating their emotions once they are in the cyber space. However, some persons could turn out particularly effective in this exercise and could then be mobilized even when they are not leaders or managers in real life.

Our article is structured as follows: Section 2 discusses the theoretical background of emotional intelligence and explains why we consider the Salovey and Mayer view; Section 3 presents the dimensions of Cyber Emotional Intelligence and shows the differences between the two concepts; Section 4 discusses who benefits most from Cyber

Emotional Intelligence; Section 5 concludes the discussion.

## **2. Theory of Emotional Intelligence**

Emotional intelligence is at the heart of extensive analytical and empirical debates. At least three approaches are distinguished in the literature. On the one hand, Mayer, Caruso and Salovey have considered emotional intelligence as a set of social skills and abilities distinct from intellectual intelligence. In this approach, emotional intelligence is a kind of cognitive intelligence. For these authors, the cognitive processes are the expression, comprehension and management of emotions. On the other hand, alternative approaches also exist, moderating the role of the cognitive process and stressing the need to consider social process. Authors like Goleman, Bar-On or Cooper and Sawaf have developed alternative views on emotional intelligence that are more likely to be applied in organizational context. Finally, the notion of emotional competencies was developed as an alternative concept for emotional intelligence (Saarni, 1999). On this line of research, emotional competencies are developed in a specific context and require appropriate learning. There is a difference pertaining to emotional intelligence as “inherited” capital. Big differences may exist between people in this area, and emotional competencies require learning. Hence, everyone may foster their emotional competencies by specific learning in social context, and there is a chance for everyone to develop their emotional competencies. The third approach, considering the social interactions and the associated learning process, is at the heart of recent analysis.

Competencies-based approaches provide a more abundant discourse required to understand the behaviour and the attitudes of people engaged in social interactions. However, it seems hard to develop a theory based on it for our reflexion at this stage. We choose, within the framework of this article, to centre our developments on the abilities-based approach. The main reason for this methodological choice concerns the fact that the alternative approaches emphasize the social dimensions of real-life interactions, which are almost absent during virtual interactions. Another argument is that the mental and cognitive skills are present in both types of interactions (real and virtual); however, the real social dimension is absent from the cyberworld and it may be expressed differently.

The Mayer and Salovey model (1997) presents the emotional intelligence in four branches – from the basic to the most fundamental and most advanced psychological processes. The basic level includes the perception, the evaluation, and the expression of emotion. Once these qualifications are mastered, we pass on to the facilitation of the thought and then the analysis of feelings and the use of the emotional knowledge. The highest and most integrated level implies the regulation of feelings for a better emotional and intellectual development.

In this model, each of the four branches represents a necessary step facilitating the “passage” to the next branch. Perception of emotions represents a necessary condition for assimilation, which representing a basis necessary to understand our emotions. Finally, the understanding contributes to the regulation of our feelings. A person endowed with a high quotient of emotional intelligence progresses more quickly through the various levels of the process and masters every capacity completely (Mayer & Salovey, 1997).

### **3. From Emotional Intelligence to Cyber Emotional Intelligence**

From our point of view, social interactions on the Internet modify the intensity and the form of the expression of emotions. As we consider the work of Salovey and Mayer (1990) as a starting point, we propose a critical discussion of each dimension of EI proposed by these authors. We want to show what the changes are and how deep they are. Our main finding is that some people might have low emotional intelligence in real life, but feel better in the cyber space and have high cyber emotional intelligence and vice-versa. Cyber Emotional Competencies are different from Emotional Competencies expressed in real life.

#### **3.1. Expression and perception of emotions**

The first dimension concerns the capacity of the individuals to express and perceive feelings (emotions). How do people express and perceive emotions in the cyber space?

##### **3.1.1. Expression of emotions on the Internet**

The use of the Internet does not modify at all the capacity of the individuals to express their feelings. However, the awareness of the presence of an intermediary in the communication changes the situation of expressing emotions to an extent.

The CMC (Computer Mediated Communication) is generally supposed to lack non-verbal communication cues. Two alternative theories are generally considered. According to the Social presence theory of communication, communication of emotions is difficult for both the sender and the receiver in the case of absence of social contact. In other words, individuals cannot express their emotions in this context completely.

From a more moderate point of view, the theory of channels expansion asserts that individuals can find how to enrich the communication expressed within the communication channel by putting in some non-verbal cues.

An illustration of this trend is the use of the emoticons on the diverse platforms, which allows expressing some emotions. It can be considered as a form of non-verbal language. In a recent study, Shao-Kang (2008) showed that “when Internet users are faced with pure text without emoticons, most people cannot perceive the correct emotion, attitude, and attention intents. However, when emoticons are added in the same context, the recipient’s perception of the messages starts to significantly change. Also, when opposite-meaning emoticons are used, the receiver shows extreme difference in perceptions. Emoticons allow receivers to correctly understand the level and direction of emotion, attitude, and attention expression. These results prove that emoticons perform nonverbal communication functions.” (Shao-Kang, 2008).

Individuals seem to be able to express emotions, but in different and new ways. This expression requires modalities of adjustment to the used means of support and a learning process of the new languages in which other individuals express themselves. In our opinion, the way that these new technologies will be able to consider the non-verbal language and offer alternatives to people remains the main challenge for new platforms and applications on Web 2.0. Most of platforms nowadays enrich their applications by using video or visioconference to tackle this issue.

##### **3.1.2. Perception of emotions on the Internet**

The use of the Internet and the Web 2.0 applications slightly modifies the perception of appropriate emotions. However, the new media could help to better understand and perceive one’s own emotions through the feedback and the reactions aroused in other Internet users. Still, the important modification concerns the capacity of the individuals to perceive the emotions of others

in this new environment. Indeed, the presence of the intermediated communication could bias the perception of the expressed emotions.

In fact, non-verbal communication which allows a better perception of the individuals' emotions is weakly present in the new context. For example, a debate was established recently between the practitioners and theorists of coaching on the impact of new mediated communication on the perception of the individuals' emotions. While some practitioners recommend face-to-face interactions in order to detect the different forms of communication (voice, physical posture, facial expressions, words, regards etc.), for other practitioners the context of mediated communication is more in favor of expressing emotions. Persons may go through their initial constraints and their handicaps due to face-to-face communication. Moreover, the adoption of the new configuration very quickly gained ground and became the rule.

On the ground of the emotional skills, while individuals having capabilities to express and perceive emotions stemming from the non-verbal language are more able to exploit their skills in face-to-face interactions, in the cyber world, additional skills are necessary to mitigate the absence of non-verbal language. On the one hand, some manage to replace this by writing skills. On the other hand, the technological evolutions increasingly allow moving the context of the interactions on the Internet closer to the real context. The ways of perceiving emotions are important and it is recommended to stress it.

### **3.2. The uses of emotions**

The second dimension is the use of emotions in the intellectual process of thought and reflection. The main idea here concerns the ability of the individuals to use and generate feelings in order to manage intellectual processes during their activities on Internet. The use of feelings requires considering the ways in which we judge a situation according to our emotional states and how we moderate them. So, we can avoid the euphoria associated to a positive emotion or to "overcome" the pessimism associated to a negative emotion.

Communication and exchange through social networks appear, in a way, as a transcription of our emotional states. In most of the social networks like Facebook people are used to expressing their daily emotions and feelings by writing banners and communicating them to their friends. This process of communication of emotions could lead to

moderating their effects of the associated initial emotions. However, people do not have the same ability to express their emotions in this setting. This process seems to stimulate people's creativity and innovativeness. The absence of autocensorship and the encouragement by peers on the Internet stimulate participative dynamics and, subsequently, innovation.

There is convergence at the micro-economic level and also at the macro-economic level on the evidence that the intensity and the rate of innovation is changing. The Internet and collaborative dynamics induced seem to stimulate innovation. This is due to higher levels of involvement of the individuals in the processes of exploration/exploitation of new technologies and applications (Bellon, Ben Youssef, & M'henni, 2007), and also due to the increase of collective intelligence and individual creativity. Technological solutions offered by Web 2.0 and social networking allow widening the interactions between individuals about their ideas and their thoughts. What we would like to highlight is the fact that this collective dynamic is not possible without sharing emotions. Web 2.0 incites individuals to dare more and propose their original ideas and their creations without autocensorship. The feedback from other Internet users and virtual friends or communities is the only judge of the value of the ideas and innovations. The collective dynamics of sharing videos, photos, films, software, applications etc. are changing many economic sectors by the users' innovations.

Once again, it is important to note that people do not have the same capabilities in terms of using their emotions to stimulate creativity and thought in the cyber space. Firstly, we think that in cyber space the size of the expression of emotions is more important for individuals because of the absence of barriers with the recipients of feelings, as then their impact on the stimulation of thought is more important. Secondly, people seem to express more intensively their creativity because they do not fear any censor like it happens in the real world. It is widely accepted that people are participating more and more in the dynamics induced by Web 2.0. We advocate the idea that Web 2.0 is an emotional web where the expression of emotions helps people in their creativity and innovation. However, important individual differences are noticed at this level, so that there is a need to understand what the benefits from these changes are. The stimulation by the emotional universe of Web 2.0 depends on the individuals' skills.

## 4. Understanding Emotions

Having characterized the perception and the expression of emotions, the next step is to understand one's own and others' emotions. Does the Internet allow the development of the ability to recognize, identify and interpret emotions?

Two main arguments are developed here. They concern the intensification of the interactions and experimentation in more or less hidden virtual appearance. Indeed, we could consider two striking dimensions of Web 2.0. On the one hand, the process of subjectivisation and on the other, the process of personal simulation. These two types of experiment allow individuals to develop an important culture of feelings thanks to Web 2.0.

The process of subjectivation is the process by which individuals show themselves on the net. All the Internet platforms require the first step of identification by giving the other Internet users minimum information. Afterwards, the individuals add more and more subtle signs revealing what they are and what they would like to be. Generally, they add photos, pieces of music, their relational networks, their comments and their preferences. According to this process, the personal identity of the individuals appears more as a temporal construction than as a stable state. Indeed, the individuals through their regular activities make and feed their virtual identities. The correspondence between their real identity and narrative activities on platforms allows them to feed their virtual identities. So, this process of creation of virtual identity could allow the experiment of more diverse feelings and a better understanding of their utilities in different contexts.

At the same time, self-simulation is experimented. The reflexivity (distance) between the real personality and the virtual identity led to a better understanding of particular dimensions relative to the feelings. The individuals learn to understand the meanings and the direction of their feelings.

"The endorsement of a role is a partial and auto-limited activity. Nevertheless, we can propose the hypothesis that this skill 'to pretend that' provides the possibility of extending findings in the digital universe, of diversifying and of specializing. However, the endorsement of a role, like the simple swelling of personality's feature, the pure and simple disguise, would not be interpreted as naïve abandonment in the imaginary power of one's fictions of oneself. It contributes to an increase of the reflexive capacities by which the persons adjust themselves, in varied contexts and

according to diverse modalities. The images that surround the persons have, generally speaking, support points to extract or to consider with distance the behaviour which their role makes them assume. In this respect, the multiplicity of the expressions of identity confers on the digital space a cleanly experimental character. People assume these roles with a disconcerting ease. They are able to improve their identical potentialities and to feel their effects" (Cardon, 2008).

All the users cannot reach this capacity. It requires a high degree of consciousness of the feelings and their control (mastery) in the previous two stages. Furthermore, it would be a question here of developing a knowledge relative to the feelings and their way of functioning. After observing the results of their feelings on their considered outcomes, individuals are supposed to draw conclusions and model the manners in which their emotions function. These capabilities are not obvious and require a conscious learning process, but it is not always the case.

Unlike face-to-face conversations, on-line conversations place the user in a communicationnal device in the center of which he is alone, in front of a world into which he gets. In front of this space, physically confined by the edges of the screen and inhabited by multiple representations of persons, the user is naturally led to interpret his position as superior. There he observes the human race and communicates with representations. This spatial arrangement operates as a figure of space, offering to the identical process a very favorable setting for its own development (Georges, 2009). Thus the cyber world contributes to the development of self-respect and self-esteem.

Unlike Georges (2009) we argue that this superior position also allows developing culture and emotional knowledge. Important individual and collective differences can be shown in terms of mastering and controlling this dimension. There is a need to develop studies dedicated to these particular dimensions.

## 5. Managing Emotions

Managing feelings is the ultimate stage of emotional intelligence. It supposes that people master the previous stages. Regulating emotions could be reduced to two types of major actions: on the one hand, easing the negative affects and on the other strengthening the positive effects. Two techniques are used for moderating negative feelings. The first one is known under the term of

cognitive revaluation, while the second concerns the search for a greater social contact. Indeed, negative feelings are not generally caused by a given situation but rather by an evaluation, which the individual makes. It is then possible to moderate negative emotion by looking for another evaluation of the situation, another way of envisaging it. Besides, breaking the isolation is a factor of mitigating negative feelings.

Sharing emotional states with others and re-evaluating the situation according to the interactions with the other Internet users then allows a regulation of emotional states. The banners of announcement of Facebook offer a ground of analysis convenient for these types of interactions around negative feelings. Obviously, this is not systematic.

In the field of positive feelings, regulation consists of stressing, prolonging and increasing their perception. The most used techniques are the physical regulation and the total awareness. It is a question of expressing associated happiness and enjoyment mostly by physical movements, words, or smiles. Another way concerns the awareness of the moments of well-being in order to prolong them. Social interactions also allow a regulation of the positive feelings due to the fact that people share their emotions.

The use of feelings in a strategic way in order to reach given objectives is more problematic to investigate. Individuals use the platforms of Web 2.0 to adjust and regulate their own feelings and the feelings of others in a conscious and reflected way in order to facilitate their emotional and intellectual development.

As we have explained previously, the platforms of interactions on the Internet offer an important ground for experiments in terms of expressed successful feelings. The process of regulation could then be made by feedback. The repetition of situations seems to us more important in the virtual world than in reality. The modalities of reactions are more audacious (less retained). So, in mediated communication, no person could notice the real introversion of another person. The process of learning and the interactions could go as far as regulating the feelings of others.

Hence, in this respect, it is advisable to underline the strength of blogs, Wikis and thematic forums centred on experience-sharing in particular for those who have a particular handicap. The exchanges facilitate the conscience to encourage, to comfort, even to bring moral support. This dynamics could allow the most expert users to act

on the feelings of the others with the objective to develop their own skills and those of the others.

This movement of relationship with ourselves, dialogue with our own personality through the others, is evident when we look at the explicit comments addressed to other members of a given social network like ("What do you think of it?", "Do you agree with me?", "Leave me a comment", or perhaps "Sign my visitors' book to leave a track of your passage").

The diverse degrees of visibility on Internet also allow facing situations and feelings associated more easily in the Cyber world than in the real world. So, the strategies of visibility allow the individuals to find the best configuration in which they express their feelings in the most adequate way. This could lead to a more effective regulation of their feelings and those of the others.

In other words, the social interactions on the Internet allow a wide and large-scale research into the impacts of the different feelings on other individuals. This is due to the association between visibility and strategic use of the feelings. The process looks like a trial and error process. At first, the strategic aspects is quickly at the heart of preoccupations. The same person can have numerous existences on Web 2.0 in the form of an avatar on Secondlife, real profiles informed about himself in Facebook, profiles of a fictitious person on MySpace, pseudonyme on Dailymotion ... This reproduction of strategies will have an impact on the strategic ways of expression the feelings. The risk of solitude and isolation was mentioned partly of the theoretical works covering Web 1.0 but this seems less the case in Web 2.0. Indeed, individuals have to feed their virtual existences from the real experiences.

## **6. Cyber Emotional Competencies:**

### **Who Performs Better?**

The precedent section shows that specific emotional skills are needed on Internet in order to build a social capital and benefit from the virtual interactions. These Emotional skills are different from the Emotinal abilities or skills in face-to-face situations. Introverted persons, or people with a handicap might have more motivation to acquire these capabilities and to have successful strategies in the cyberspace. Most of recent contributions support the hypothesis that in the Cyber Space people with weak emotional intelligence may have High level of Cyber Emotional Intelligence.

Dong et al. (Dong, Urista, & Gundrum, 2008) tried to understand how the level of emotional

intelligence of the individuals impacts their commitments to use “romantic communications” on MySpace (the search for partners). From a sample of 240 individuals the authors demonstrate the existence of a negative correlation between the quotient of emotional intelligence and the commitment in a romantic communication on Internet. This would mean that social networks on Internet better suit those who have a low quotient of emotional intelligence. These people manage to overcome better certain hesitations to make a commitment in relations in the real life (stress, lack of confidence, handicaps, low self-esteem). This point of view is shared by Amichai-Hamburger and al. (Amichai-Hamburger, Wainapel, & Fox, 2009). According to these authors, the extrovert and not neurotic persons find themselves in the daily life and in the real interactions. However, introvert and neurotic persons find more themselves on Internet and in the social interactions on Internet.

Bargh, McKenna and Fitzsimons (2002) show that «for people who felt that their identity carried a stigma with it, the anonymous Internet environment and the ease with which it is possible to find like-minded people helped them to build significant relationships with others. Some of them actually chose to meet their Internet respondent face to face and even entered into matrimony».

Ellison et al. (Ellison, Steinfield, & Lampe, 2007) showed in a recent study that students who most benefit from Facebook in matter of social capital are those who have the biggest lack of self-esteem and of satisfaction in their life.

Amichai-Hamburger et al. (2009) argued that Internet offers multiple services (especially in the context of Web 2.0) and there is an interaction between Internet users and their personalities. Every person will find the appropriate services and will benefit from them. Considering this point of view, Internet and Web 2.0 improve the social capital and the performances of Low and High real emotional intelligence. There is no a priori reason to the fact that Low emotional intelligence will have high Cyber Emotional Intelligence.

More generally, we agree with Bargh et al. (2002) view. According to these authors, two main motivations for individuals are supposed to exist when they use Internet for their social interactions: self-related motivations and social-related motivations. Thus, when individuals have not satisfied their needs in the real life they try to satisfy them by looking at Internet. Their concept of Real me consists in defending the idea that people try to find the social environment where

they fully express their capabilities. For some people, this is the case in the real world and for other people Cyber space is more appropriate. Social Interactions on Internet is a complement to real social interactions but needs specific emotional intelligence in order to reach the desired outcomes.

## 7. Conclusion

The objective of this article was to characterize the social interactions in the Internet and the forms of Intelligence used by people in that context. We demonstrate that Cyber Emotional Intelligence is an alternative construct that fits well for the explanation of Internet social interactions. We show big differences between the notion of emotional intelligence as developed by Salovey and Mayer and Cyber emotional intelligence that we propose. We find that at each stage people do not have the same ability to express and manage their emotions. While our work considered the Salovey and Mayer (1990) as a starting point, other academic alternatives may be used in order to illustrate our concept. The approach developed by Saarni (1999) may offer a more appropriate setting in order to go deeper in the analysis. The key-point is not whether people have or have not Cyber Emotional Intelligence, it is more about how to develop the initial level of Cyber Emotional Competencies.

As the Cyber space is becoming more intelligent (Web 3.0) and more complex people need to express more and more their Cyber Emotional Intelligence in order to reach better outcomes (life, learning, work...).

Two possible extensions of our current work may be done. First, there's a need to test empirically our concept by developing an appropriate measurement for Cyber Emotional Intelligence. Second, while we have tried to describe the general trends of the cyber space, we think that an appropriate research strategy consists in describing the dynamics in each context or application (Facebook, blogs, Dailymotion, Twitter, Second Life...).

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## References

- Adler, P., & Kwon, S. (2002). Social capital: Prospects for a new concept. *The Academy of Management Review*, 27 (1), 17-40.
- Amichai-Hamburger, Y., Wainapel, G., & Fox, S. (2009). On the Internet No One Knows I'm Introvert: Extroversion, Neuroticism, and Internet Interaction. *CyberPsychology & Behavior*, 5 (2), 125-128.
- Bargh, J. A., McKenna, K. Y., & Fitzsimons, G. (2002). Can You See the Real Me? Activation and Expression of the "True Self" on the Internet. *Journal of Social Issues*, 58 (1), 33-48.
- Bar-On, R. (1997). *the Bar-On Emotional Quotient Inventory (EQ-i): A Test of Emotional Intelligence*. Toronto: Multi-Health Systems.
- Bellon, B., Ben Youssef, A., & M'henni, H. (2007, November). *Usage capacités de ICTs in emergent*. Retrieved March 30, 2010, from MPRA: [http://mpra.ub.uni-muenchen.de/27538/2/MPRA\\_paper\\_27538.pdf](http://mpra.ub.uni-muenchen.de/27538/2/MPRA_paper_27538.pdf)
- Ben Youssef, A. (2004). Les quatre dimensions de la fracture numérique. *Réseaux*, 5 (158), 141-180.
- Benkler, Y. (2006). *The Wealth of Network : How Social Production Transforms Markets and Freedom*. Boston: Yale University Press.
- Beuscart, J. S., Cardon, D., Pissard, N., & Prieur, C. (2009). *Pourquoi Partager mes photos de vacances avec des inconnus*. Retrieved March 30, 2010, from Academia.edu: [http://laborange.academia.edu/JeanSamuelBeuscart/Papers/287011/Pourquoi\\_partager\\_mes\\_photos\\_de\\_vacances\\_avec\\_des\\_inconnus\\_Une\\_etude\\_de\\_Flickr\\_Reseaux\\_154\\_mars\\_2009](http://laborange.academia.edu/JeanSamuelBeuscart/Papers/287011/Pourquoi_partager_mes_photos_de_vacances_avec_des_inconnus_Une_etude_de_Flickr_Reseaux_154_mars_2009)
- Caby-Guillemet, L., Guesmi, S., & Mallard, A. (2009). *Wiki Professionnel et coopération en réseau : une étude exploratoire*. Retrieved March 10, 2010, from Cairn.info: <http://www.cairn.info/revue-reseaux-2009-2-page-195.htm#>
- Cardon, D. (2008). *Le design de la visibilité : un essai de typologie du web 2.0*. Retrieved March 10, 2010, from Jeunesse et de la Vie associative: <http://www.jeunesse-vie-associative.gouv.fr/IMG/pdf/typo.pdf>
- Chaulet, J. (2009). *Sélection, appariement et modes d'engagement dans les sites de mise en relation*. Retrieved March 20, 2010, from Cairn.info: <http://www.cairn.info/revue-reseaux-2009-2-page-131.htm>
- Cooper, R. K., & Sawaf, A. (1996). *Executive EQ: emotional intelligence in leadership and organizations*. New York: Grossett/Putnam.
- Dong, Q., Urista, M. A., & Gundrum, D. (2008). The Impact of Emotional Intelligence, Self-Esteem, and Self-Image on Romantic Communications over MySpace. *CyberPsychology and Behavior*, 11 (5), 577-578.
- Ellison, N. B., Steinfield, C., & Lampe, C. (2007). The benefits of Facebook "friends." Social capital and college students' use of online social network sites. *Journal of Computer-Mediated Communication*, 12 (4), 1143-1168.
- Engelberg, E., & Sjöberg, L. (2004). Internet Use, Social Skills, and Adjustment. *CyberPsychology & Behavior*, 7 (1), 41-47.
- OECD. (2007, April 12). *Participative Web: User-Created Content*. Retrieved March 10, 2010, from OECD: <http://www.oecd.org/dataoecd/57/14/38393115.pdf>
- Gensollen, M. (2006). *La culture entre économie et écologie : l'exemple des communautés en ligne*. Retrieved March 13, 2010, from Gensollen: [http://www.gensollen.net/JEC\\_2006\\_communautes\\_envoi.pdf](http://www.gensollen.net/JEC_2006_communautes_envoi.pdf)
- Georges, F. (2009). *Représentation de soi et identité numérique. Une approche sémiotique et quantitative de l'emprise culturelle du web 2.0*. Retrieved March 10, 2010, from Cairn.info: <http://www.cairn.info/revue-reseaux-2009-2-page-165.htm>
- Goleman, D. (1995). *Emotional intelligence*. New York: Bantam Books.
- Ivcevic, Z., Brackett, M. A., & Mayer, J. D. (2007). Emotional Intelligence and Emotional Creativity. *Journal of Personality*, 75 (2), 199-236.
- Lafranchise, N., Lafortune, L., & Rousseau, N. (2007). *Insertion professionnelle, émotions, compétence émotionnelle et accompagnement des personnes enseignantes*. Retrieved March 11, 2010, from Congrès International AREF: [http://www.congresintaref.org/actes\\_pdf/AREF2007\\_Nathalie\\_LAFRANCHI\\_SE\\_445.pdf](http://www.congresintaref.org/actes_pdf/AREF2007_Nathalie_LAFRANCHI_SE_445.pdf)
- Martinez-Miranda, J., & Aldea, A. (2005). Emotions in human and artificial intelligence. *Computers in Human Behavior*, 21 (2), 323-341.
- Mayer, J. D., & Salovey, P. (1997). What is emotional intelligence. In P. Salovey, & D. Sluyter (Eds.), *Emotional development and emotional intelligence: Educational implications* (pp. 3-31). New York: Basic Books.
- Mayer, J. D., Caruso, D. R., & Salovey, P. (1999). Emotional intelligence meets traditional standards for an intelligence. *Intelligence*, 27 (4), 267-298.
- Nahapiet, J., & Ghoshal, S. (1998). Social Capital, Intellectual Capital, and the Organizational Advantage. *The Academy of Management Review*, 23 (2), 242-266.
- Rhee, K. S., & White, R. (2007). The Emotional Intelligence of Entrepreneur. *Journal of Small Business and Entrepreneurship*, 20 (4), 409-426.
- Saarni, C. (1999). *The development of emotional competence*. New York: Guilford.
- Salovey, P., & Mayer, J. D. (1990). Emotional intelligence. *Imagination, Cognition, and Intelligence*, 9 (3), 185-211.
- Shao-Kang, L. (2008). The Nonverbal Communications Functions of Emoticons in Computer-Mediated Communication. *CyberPsychology & Behavior*, 11 (5), 595-597.
- Shaw, L. H., & Gant, L. M. (2002). In Defense of the Internet: The Relationship between Internet Communication and Depression, Loneliness, Self-Esteem, and Perceived Social Support. *CyberPsychology & Behavior*, 5 (2), 157-171.

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