

The Cloverleaves of Social Media Challenges for e-Governments

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Abstract: Along with many positive impacts, the development and use of social media in and by the public sector introduces a number of challenges and unanswered questions. This paper looks into the following: General accessibility and usability issues, trust and credibility; roles of public employees as users of social media. Also, case handling procedures, document safety and public procurement issues connected to introduction of social media on public media web-sites are discussed. These issues are illustrated by examples from the Nordic countries. The objective of this paper is to highlight some of the main challenges of social media when deployed by public authorities, and through this approach to ensure that European public bodies take necessary action to develop adequate social media strategies.

1. Introduction

Governments all over the world are offering a rapidly increasing number of on-line services to businesses and citizens. Today, practically all European governments use the Internet and the World Wide Web as a means of communication and dissemination of information, thus climbing towards the top levels of maturity as far as interactivity of electronic services is concerned [1, 2, 3, 4]. During the last few years, social media [5] – or Web 2.0 – are challenging and changing what had been an established pattern.

For private persons, taking part in social media has become an essential part of daily life and a way of interacting and socializing with others. Facebook [6] with its hundreds of millions of users world-wide is probably the best example, followed by Twitter [7], virtual worlds, blogs, content sharing etc. For government offices, municipalities and other public organisations, the social media are a recent innovation. Facebook- and Twitter-logos for sign-on are popping up on their web-pages, and citizens are offered yet another channel for communication and participation. In Norway, ministries have been reluctant to connect to social media on their web-pages [8], but their subordinate agencies and institutions are eagerly following the new trend (Figure 1).

This is also the case for the Finnish ministries [9] and their subordinate agencies and institutions, while the Danish ministries [10] seem to practice a “social media free zone” also at the level of (at least most) subordinate agencies and institutions. In Sweden, the situation is similar [11].

Along with many positive impacts, this development introduces a number of challenges and unanswered questions. This paper looks briefly into some of these:

1. General accessibility and usability issues.
2. Trust and credibility.
3. Roles of public employees as users of social media and case handling procedures.
4. Public procurement.

In this paper, these issues are illustrated by examples from the Nordic countries. The objective of this paper is to direct attention to the rising challenges, and thus to inspire

European public bodies to develop adequate social media strategies to handle the use of the new media in a professional and responsible manner.



Figure 1. Examples of one Norwegian ministry and one government agency that link to social media from their web-pages (the Ministry of Health and Care Services [12] and the Norwegian Industrial Property Office [13] with links to Facebook, Twitter, Youtube and Flickr.

2. Challenges of Social Media for Public Bodies

2.1 Method of study

This paper is based on literature studies and empirical walkthroughs of public web-sites in the Nordic countries.

2.2 Areas of concern

Accessibility of all public information and services is a requirement in many European countries, also when these are web-based. In fact, two central ICT-policy areas of this decade are e-Accessibility and e-Inclusion, both in EU [14, 15] and the USA (the US Rehabilitation act [16]). These policies have been implemented in legislation, such as the anti-discrimination law of Norway [17], and the European policies and laws for public procurement [18]. However, it has been pointed out that people with disabilities in Europe continue to be confronted with many barriers when using everyday ICT-products and services [19]. In the context of social media, this problem seems to escalate.

Two recent studies document rather poor accessibility of social media. A Swedish accessibility study of five social media (including Facebook and Twitter; 483 recipients, 119 replies) reports that these media have severe accessibility problems [20]. Many of the reported problems make the use of social media difficult, if not impossible, for persons with disabilities, i.e., deaf blind persons, visually impaired and blind persons, persons with motor difficulties, and persons with cognitive problems.

A Norwegian study, based on an on-line survey of accessibility of social media (including Facebook and Twitter; 101 replies) reports similar results, although more focussed on the challenges encountered by visually impaired users [21]. This is a large user

group, including e.g., a majority of the elderly generation. For severely visually impaired persons, the use of assistive technologies, such as speech synthesizers or screen readers, is seriously hampered by the accessibility problems.

For the cognitively disabled users, the situation is equally bad. Cognitively disabled people have difficulties interpreting what is seen or heard and/or difficulties making mental connections between different pieces of information, or have trouble with abstract reasoning. The type and degree of cognitive impairment can vary widely. Well-known cognitive impairments are dyslexia, dyscalculia, learning and language disabilities, memory deficit, or difficulties with orientation and concentration [22].

Cognitive skills and abilities, or the lack of these, thus define an important area of concern in the context of accessibility and usability of social media. Here one single example from statistics clearly shows the extent of the challenge: International estimates show that 15-20% of the population have a language-based learning disability [23]. In particular, the Swedish study reports accessibility problems that are very harmful for this compound group of users. Also elderly people often suffer from cognitive impairments such as memory loss or orientation problems. Examples of accessibility problems for these users are the complexity of social media as such, changing layout, inconsistent link representations, and lack of language support for small language groups.

The results from these two reports, put together, should seriously worry the accessibility law makers, as well as the ICT-departments within the public sector. For example, the Norwegian government aims at ensuring that all technological solutions involving ICT in the public sector shall be based on Universal Design (Design for All) [24, 25], promotes accessibility and e-Inclusion [26, 27], as well as anti-discrimination and the rights of disabled people (by law) [17]. In the field of procurement, the Norwegian legislation has been changed to correspond to the EU Directive. According to this legislation, universal design must be considered in each procurement process [28].

There is no doubt that the social media represent an extension of traditional web-solutions of e-Governments. The current policies, laws, standards and guidelines all stop short of the social media. Nor are these media subject to any procurement procedures, but the linking icons are just “put” on the web-sites. In short, so-called threshold values are not exceeded as the social media do not cost anything, and consequently, there is no procurement process. Moreover, the ministries, their subordinate agencies and other public bodies have really no say in the design of the social media; the design and functionalities are decided by the legal owners of the service and follow the accessibility legislation of the country of origin. These considerations together define a landscape that is difficult to manage for public organisations and the users of their citizens.

Public sector organisations shall serve citizens and businesses. Basic assumptions behind the public sector are that all case handling meets broadly accepted expectations, respects the interests of citizens and businesses, practices objectivity and follows common performance standards. This should ensure accurate prediction of outcomes of any case handling as the formal rules are well-defined according to laws and regulations. In short, citizens and businesses expect accurate accountability and excellent “stewardship”.

These expectations are challenged when social media enter the stage as part of the technological communication platform. Modern public sector deploys many different ICTs in communication with citizens and businesses and base the case-handling on dedicated ICT-based systems and services. These have usually been adapted to the business processes and legal requirements of objective and transparent case-handling. Social media interfere with this practice by allowing informal communication to take place, and enable case-handlers to interact with the client (citizens or businesses) separately from the formal flow of information. Clearly, it may be difficult to understand the role of a case handler or case manager, if s/he interacts with the client through social media. Confusion of roles arise if or

when there is no clarity concerning the role(s); Whom does the case handler or case manager represent if the communication takes place through Twitter, at 9 o'clock in the evening – herself/himself as a private person, or her/his employer (i.e., the public body)? This problem is increasing, and guidelines are called for.

Luckily, many organisations within the European public sector have recognised the potential problem. Guidelines for communication through social media for civil servants are being developed. One example of such guidelines is the Civil Service Code of UK Government [29]. This applies to participation online as a civil servant or when discussing government business. Such rules are of great importance, and are therefore quoted below:

“Disclose your position as a representative of your department or agency unless there are exceptional circumstances, such as a potential threat to personal security. Never give out personal details like home address and phone numbers.

Always remember that participation online results in your comments being permanently available and open to being republished in other media. Stay within the legal framework and be aware that libel, defamation, copyright and data protection laws apply. This means that you should not disclose information, make commitments or engage in activities on behalf of Government unless you are authorised to do so. This authority may already be delegated or may be explicitly granted depending on your organisation.

Also be aware that this may attract media interest in you as an individual, so proceed with care whether you are participating in an official or a personal capacity. If you have any doubts, take advice from your line manager.

- 1. Be credible: Be accurate, fair, thorough and transparent.*
- 2. Be consistent: Encourage constructive criticism and deliberation. Be cordial, honest and professional at all times.*
- 3. Be responsive: When you gain insight, share it where appropriate.*
- 4. Be integrated: Wherever possible, align online participation with other offline communications.*
- 5. Be a civil servant: Remember that you are an ambassador for your organisation. Wherever possible, disclose your position as a representative of your department or agency.”*

These guidelines are, however, just a beginning. It is obvious that more profound codes of practice have to be developed in order to address the complexity of the field and to be applicable in a number of different case handling and case management contexts. Most public organisations have a long way to go to satisfy criteria for case-handling and management if social media are used in the communication between the public sector's actors, and citizens or businesses.

Yet another problem that seems to be emerging is the peculiar mixture of information content and commercial content. In Figure 2, two examples of this absurdity are provided. Norwegian NAV (The Norwegian Labour and Welfare Service, [30]) and Swedish Arbetsförmedlingen (the Swedish Public Employment Service [31]) are chosen as examples to illustrate such confusing content. Both organisations target persons with economic or employment issues, and therefore have a special responsibility to follow strict rules of trustworthiness. It is tempting to ask if this is really so when advertisements for “free eyeglasses” appear on their Facebooks [32, 33].

3. Conclusions and recommendations

This paper has looked into the increasing use of social media within the public sector in the Nordic countries. More and more often, public agencies and organisations link to Facebook, Twitter, and the like, from their own websites. Alternatively, governmental agencies link to

these media in connection with campaigns, “happenings” or competitions (such as idea competitions as part of e-Participation).



Figure 2. Facebook of two Nordic public agencies: Commercial content “Free eyeglasses” appears side-by-side with information to unemployed and disabled people [30, 31].

This development introduces several challenges. In this paper we have highlighted the following four (Figure 3):

1. General accessibility and usability connected to security, privacy, understandability and information overload (the latter is, in fact, a well-documented problem of the “information age” since the eighties [34, 35]). Since the legislation in many European countries requires universal design or design for all (also for ICTs), it appears rather peculiar that governmental agencies link to poorly accessible sites and media, such as Facebook.
2. Trust and credibility when commercials appear in the context of public information. Many users may have trouble distinguishing clearly between the two content providers' contributions.
3. Roles of public employees (civil servants) as participants in social media – whom do they represent in the different contexts, or at different times of the day (working hours vs. leisure time)? Will contributions on Twitter or Facebook represent their employer's official standpoints in connection with case handling or case management, or the private opinion of the particular employee?
4. Public procurement. In European countries, legislation regulating public procurement is rather strict. How can commercial services, such as Facebook or Twitter appear on public websites, and practically by-pass all rules and regulations connected to public procurement? Who bought the Facebook-part of the e-Service, and based on which authorisation?

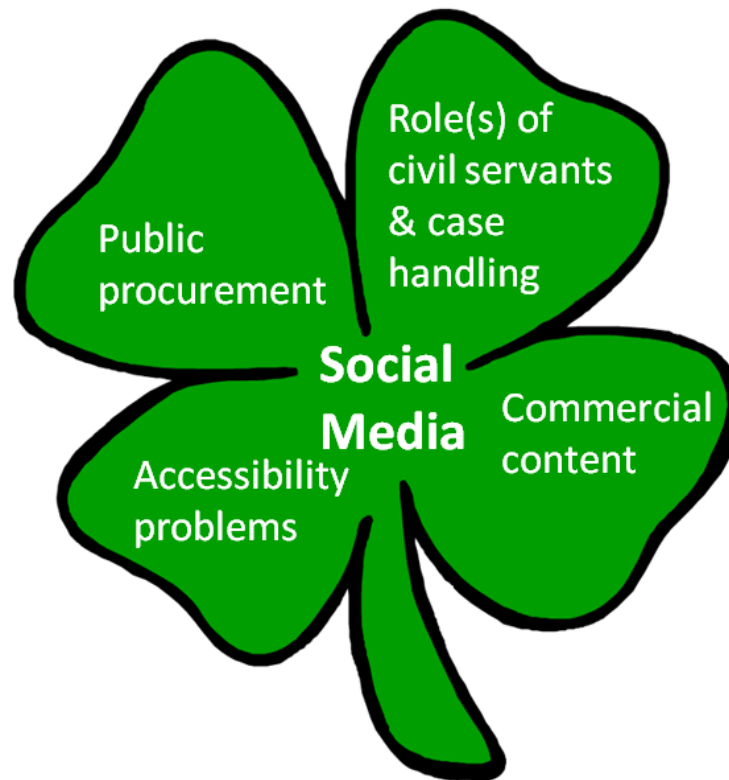


Figure 3. Main social media challenges for the public sector.

In this paper, these issues have been illustrated by examples from Nordic e-Government websites (Norway, Sweden, Finland, and Denmark). The ultimate objective of this paper is to draw attention to the rising challenges of social media, and thus to attempt to inspire European public bodies to develop adequate social media strategies to handle the use of the new media in a professional and responsible way. For example in Norway and Sweden strategy documents exist that deal with social media [36, 37]. The advice given seems to be rather general, and does not differ much from guidelines published for more traditional electronic communication, such as e-mail, public journals or systems for business processes on the one hand, and for ICT-development projects in general on the other hand. More specific strategies and guidelines that focus on issues such as the four mentioned above are missing.

Therefore, our first recommendation is to invest time and effort in the production of good strategy documents and implementation processes which support the ministries', their subordinate agencies' and institutions' use of social media as an integrated communication platform vis-à-vis citizens and businesses, and which guide them to cope with issues 1-4 above. This way has to be paved; the use of the Internet is still growing, and the established and emerging social media will undoubtedly be one of the main channels of electronic communication in the near future [38].

Our second recommendation concerns the technology platform and social media themselves. Two of the problematic issues that we have pointed out in this paper – accessibility and usability, and commercial content – can be solved on alternative technology platforms. One such possibility is the Elgg platform [39]. Elgg is a “social networking engine” which delivers building blocks that enable organisations to create their own social networks and applications. Such an approach will make it possible to work around the issue of commercialisation and enable-advertisement-free social media. It will also be feasible to implement accessibility methods that assist users with disabilities. Similar platforms exist on a smaller scale, such as Origo in Norway [40]. Also this platform enables commercial-free social media to be created with a number of standard social media

functionalities. In other words, it is actually not necessary to use Facebook or Twitter, as alternative platforms may offer features that are important for public bodies for accessibility and credibility reasons.

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References

- [1] Hans Solli-Sæther: Analytical Framework for e-Government Interoperability. In: Paul Cunningham and Miriam Cunningham (Eds.): eChallenges e-2010 Conference Proceedings, Warsaw, Poland, 2010.
- [2] i2010 – A European Information Society for Growth and Employment. Commission of the European Communities, Brussels, 2005, URL: eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2005:0229:FIN:EN:PDF. Patrick Waiters, Graham Colclough, Online Availability of Public Services: How Is Europe Progressing? Capgemini, 2006, URL: ec.europa.eu/information_society/europe/i2010/docs/benchmarking/online_availability_2006.pdf
- [3] Petter Gottschalk, Hans Solli-Sæther, Stages of e-government interoperability, in: Electronic Government, An International Journal, Vol. 5, No. 3, 2008, P. 310-320.
- [4] An Information Society for All. Report No. 17 (2006–2007) to the Storting. Norwegian Ministry of Government Administration and Reform, 2006, Summary in English. URL: www.regjeringen.no/upload/FAD/Vedlegg/IKT-politikk/stm17_2006-2007_eng.pdf.
- [5] URL: en.wikipedia.org/wiki/Social_media#cite_note-7
- [6] URL: www.facebook.com
- [7] URL: www.twitter.com
- [8] URL: www.regjeringen.no/en/dep.html?id=933
- [9] URL: www.hallitus.fi/ministeriot/en.jsp
- [10] URL: www.statsministeriet.dk/a_2820.html
- [11] URL: www.regeringen.se/sb/d/385
- [12] URL: www.regjeringen.no/en/dep/hod.html?id=421
- [13] URL: www.patentstyret.no/en/
- [14] European Commission: “i2010 – A European Information Society for growth and employment” (2005). URL: ec.europa.eu/information_society/europe/i2010/docs/communications/com_229_i2010_310505_fv_en.pdf
- [15] European Commission: “A Digital Agenda for Europe” (2010). URL: eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2010:0245:FIN:EN:PDF
- [16] Section 508. June 2007. URL: www.section508.gov/
- [17] The Act on prohibition of discrimination based on ethnicity, religion, etc. (the Anti-Discrimination Act) (unofficial translation) URL: www.regjeringen.no/en/dep/aid/doc/lover_regler/reglement/2005/the-anti-discrimination-act.html?id=420606
- [18] Public eProcurement Detailed Roadmap. High Impact Services Expert Group, May 2007. URL: ec.europa.eu/information_society/activities/ict_psp/documents/eproc_roadmap.pdf
- [19] Cullen, Kevin et al.: MeAC - Measuring Progress of eAccessibility in Europe. Assessment of the Status of eAccessibility in Europe. Executive Summary. October 2007. URL: http://ec.europa.eu/information_society/activities/einclusion/docs/meac_study/meac_report_06_11_final.pdf
- [20] Andreas Cederbom et al.: “Accessibility study of social media”. Funka Nu AB, Stockholm, Sweden, 2010. (In Swedish).
- [21] Morten Tollefsen et al.: “Disabled people and the use of social media”. MediaLT AS, Oslo, Norway, 2011. (In Norwegian).
- [22] WebAim: Cognitive Disabilities. URL: webaim.org/articles/cognitive/
- [23] The International Dyslexia Association. URL: <http://www.interdys.org/FAQHowCommon.htm>
- [24] Principles for Universal Design. URL: http://www.design.ncsu.edu/cud/about_ud/udprincipleshtmlformat.html#top
- [25] NOU 2005: 8 Equality and accessibility. (Eds, A. Syse, et al.), Justis- og politidepartementet.
- [26] Report No. 17. (2006-2007) Information Society for All (Ed, FAD), Ministry of Government Administration and Reform.

- [27] Agency for Public Management and eGovernment (Difi) Web quality criteria. URL: kvalitet.difi.no/kriteriesett/#tilgjenglighet
- [28] Universal Design in Public Procurement (Universell utforming I offentlige anskaffelser. In Norwegian). Deltasenteret, 2007. URL: www.helsedirektoratet.no/vp/multimedia/archive/00013/Veileder_Universell_13513a.pdf
- [29] URL: www.civilservice.gov.uk/about/resources/participation-online.aspx
- [30] URL: www.nav.no/Andre+spr%C3%A5k
- [31] URL: www.arbetsformedlingen.se/Globalmeny/Other-languages.html
- [32] URL: www.facebook.com/home.php#!/pages/NAV-Senter-for-IKT-hjelpemidler-SIKTE/115211728510165
- [33] URL: www.facebook.com/Arbetsformedlingen
- [34] Denning, P. J. (1982). "Electronic junk," Communications of the ACM, vol. 25, no. 3.
- [35] Hiltz, S. R. and Turoff, M. (1987). "Structuring computer-mediated communication systems to avoid information overload," Communications of the ACM, vol. 28, no. 7.
- [36] Agency for Public Management and e-Government (Difi): Guidelines for social media in e-Government. 2010. (Veileder i sosiale medier for forvaltningen. In Norwegian). URL: www.difi.no/filearchive/veileder-i-sosiale-medier-for-forvaltningen-pdf.pdf
- [37] E-delegationen: Public authorities' use of social media. Riktlinjer från E-delegationen Version 1.0, 2010-12-30. (Myndigheters användning av sociala medier. In Swedish). URL: www.edelegationen.se/sites/default/files/imce/filer/publikationer/Riktlinjer_sociala_medier_v1_0.pdf
- [38] Olle Findahl: Swedes and the Internet 2010. .SE 2010. URL: www.iis.se/docs/soi2010_eng_web.pdf
- [39] URL: www.elgg.org/
- [40] URL: origo.no/-/site/global