THE DIGITAL AGENDA IN THE NORTH SEA

Results from the Online-Questionnaire

DANS – the Digital Agenda in the North Sea

DANS (Digital Agenda in the North Sea) is a cluster project. This type of cooperation was encouraged by the INTERREG IVB North Sea Region (NSR) Programme Secretariat. The DANS cluster was approved as an 18 months scheme, relating back to the three projects Smart Cities, CCC and E-CLIC.[1] The cluster construction was shaped as joint operation of several individual projects mainly to capitalise on their previous achievements, and to provide the condensed outcomes to a wider or more specified audience. NSR clusters were limited in duration and grant. However, clusters were to promise added value to dissemination and communication, to tangibility and evaluation of outcomes and impacts. The DANS cluster has achieved merits for proving success-ful already within its lifetime.

The idea of the DANS cluster's questionnaire printed in this brochure is to verify and quantify findings of the discussions among the expert groups around the three involved INTERREG projects. The key aspect was to underpin the cluster's approach to establish, in what way the Digital Agenda for Europe (DAE) might best fit for the North Sea Region (NSR) and its specifics. Or in more detail: to what extent could the outline and perhaps some of the parameters, such as the eight planned activities of the Digital Agenda for Europe, possibly benefit from selective adaptation to the region. And of course in consequence: how could the NSR benefit from optimisation of efficiency and effectiveness in terms of a targeted implementation.

[1] Smart Cities: www.smartcities.info
CCC – Creative City Challenge: www.creative-city-challenge.net
E-CLIC – European Collaborative Innovation Centres for broadband media services: www.e-clic.eu

The Digital Agenda for Europe

The DAE is one of the seven flagship initiatives of the European Union.[2] It identifies that information and communication technologies (ICT) play a key role in the Europe 2020 Strategy, namely via the internet. The DAE sketches a roadmap to maximize the social and economic potential of ICT, first and foremost by the accessibility, for work, communication, education, interaction and self-expression amongst others. The DAE aims to foster innovation, economic growth and improvements in daily life for citizens as well as business. Implementation would include aspects of new media, but also health care, energy, transport, environment, public services and cultural content.

The European Commission is determined to provide a robust and reliable legal framework, stimulating open, high-speed and broadband ICT background infrastructure. This will be flanked and surrounded by the development of an efficient spectrum policy to facilitate the involvement of the EU's structural funds and promoting take-up by citizens, their digital literacy and access. Prime aims and objectives include a balanced regulatory framework regarding governance, rights, regimes, licensing, safety and the single market for content, services and digitization. This will also affect the research and innovation funds to reinforce the EU's strengths in strategic technological fields. A core facet will be to create and improve conditions for high growth of SMEs to lead emerging markets and to stimulate innovation across ICT and related business sectors.

In this context, the EU Member States are to draw up operational high-speed internet strategies, to target public funding for addressing areas not fully served by private investments and to establish a legal framework for reducing costs through synergies of coordinated public works. The coverage with internet access is specified to reach a level of technical provision for each individual citizen.

In order to structure the implementation, the DAE featured eight planned activities, namely
1. Fast and ultra-fast internet access (»30/100MB/s«);
2. Enhancing the digital literacy, skills and inclusion;
3. Interoperability and standards;
4. ICT-enabled benefits for the EU society;
5. A vibrant digital single market;
6. Trust and security;
7. Research and innovation and
8. International aspects of the DAE.

Along these eight, the implementation of the DAE should be arranged. This is why the DANS questionnaire to a vital extent focused on these core activities.

The digital economy is growing at seven times the rate of the rest of the economy. The digital sector also changes faster than most sectors – and this refers to a widest thinkable array, from business models and job creation to devices and services, but also includes trends such as globalisation and regionalisation, social inclusion and next generation literacy. Anything to boost the Digital Agenda will have wider and positive effects.

[2] See also: http://ec.europa.eu/europe2020/europe-2020-in-a-nutshell/flagship-initiatives/index_en.htm

Reviewing the Commission's goals and plans three years into the Barroso II mandate is a matter of common sense. During summer 2012, the European Commission launched a public consultation on the DAE, offering an online discussion and receiving reportedly a wide range of proposals. The follow-up ultimately lead to a review, and on 18 December 2012, this revision was published. It identifies seven areas where we will take more focused action to create growth and jobs in Europe enhancing skills via ICT and digital technologies. These seven priorities/transformative actions for 2013 – 14 are:

1. Create a new and stable broadband regulatory environment.
2. Establish new public digital service infrastructures through Connecting Europe Facility.
3. Launch Grand Coalition on Digital Skills and Jobs.
4. Propose EU cyber-security strategy and Directive.
5. Update EU's Copyright Framework.
6. Accelerate cloud computing through public sector buying power.
7. Launch new electronics industrial strategy – an »Airbus of Chips«.

The DAE review also states that Europe needs a »wake-up call« on high speed broadband. High-speed internet is seen as the basis for the digital economy; without it, essential services such as cloud computing, eHealth, smart cities, audiovisual services – and the benefits thereby derived – are expected simply not to take off. The review thus draws up a number of assumptions:

· A 10 % increase in broadband take up could yield a 1–1.5 % increase in annual GDP or could raise labour productivity by 1.5 % over the next five years. For that reason the DAE set ambitious targets.
· Encouragingly, the coverage and penetration rates of high-speed networks in Europe are increasing, but overall, Europe trails Asia and the US and is at risk of failing to meet the 2020 targets. The Commission will present a comprehensive package to tackle market incentives to invest, provide targeted funding and reduce roll-out costs.
· The Commission is also working on freeing up a wider spectrum to implement the commitment in the Radio Spectrum Policy programme and will propose an action plan on wireless communications in 2013.

[3] ESPON project TERREVI; A. Gramillano in : Territorial Evidence for Delivering Europe, www.t33.it, 07.02.2013
[4] INTERREG project E-CLIC; Ramazan Pehlivan, atene KOM GmbH, in: Digital Society – Six user types in comparison (2009-2011), ISBN 978-3-943277-14-2, p.23;, www.atenekom.eu, Berlin, December 2011

The Digital Agenda for Europa

Growing demand for broadband infrastructure

Various studies on aspects of usage, up-take, technical provisions and coverage are being undertaken and updated regularly. They mostly agree on indicating a number of principal correlations, such as the availability of digital media and digital literacy, qualification for jobs and a stabilized regional economy: Digital literacy results in jobs with a qualification level offering relatively higher income. There also is a positive relation between the number of inhabitants with digital literacy and the regional GDP, and in a circular reference, this again fosters up-take and demand for infrastructure to back up digitisation of the labour market[3].

At the same time, more detailed observations on the trends within the applications show a growing demand for mobile services[4] – a feature that requires backbone and backhaul provisions such as a high quality fibre-optic based network across the economic cooperation sphere, which again is among the core aims and objectives named in the DAE. Further research shows that many services are already hampered to roll out full functionality or speed, so the dynamic of a society endorsing digitisation as means of common benefit and increase of welfare becomes questionable, if not academic. While the requirements for European regions within, or with similar beneficial conditions as in the »blue banana« appear to be favourable in order to accomplish the DAE in general, the details of coverage, inclusion and participation appear to add another facet to the discussion on cohesion.

INTERREG IVB NSR

The INTERREG programmes are financed from the structural ERDF (European Regional Development Fund). Within INTERREG, there are three strands, of which the B strand represents the transnational cooperation, and the time from 2007 until 2013 is counted as the 4th programme period. The next programme period will last from 2014 until 2020 and thus see the DAE's (Digital Agenda for Europe) accomplishments.

Among the 13 territorial programmes under the B strand, the North Sea Region (NSR) is the one with participation from the seven countries around the North Sea: the Flemish part of Belgium, Denmark, Eastern parts of the UK, the Southwest of Sweden, and the Northwest of the Netherlands and Germany. Also Norway participates, while not a Member State of the EU, at own costs.

The DAE related highlights since 2010

The DAE does not start from scratch – while some of the regulatory background will be under further discussion due to the ongoing debate about the 2014–2020 budgets, much of the practical detailing work is to an extent already accepted and in parts being finalised or even implemented. For example:

· The drafted Connecting Europe Facility (CEF) for fast and ultra-fast broadband and pan-European digital services of public interest, even though with a limited remainder of the initial budget.
· Delivering on DAE broadband targets – the EU has 95% coverage by fixed broadband networks in Europe – the target is to have 100% by end 2013. By 2020 the goal is for all of Europe to have access to broadband speeds of at least 30Mbps.
· Horizon 2020: all EU research and innovation funding co-ordinated under a single programme.
· The EU Cloud Strategy aims to reduce uncertainty for both cloud suppliers and adopters. It outlined steps to better define cloud computing service provision in law. A European Cloud Partnership aims at promoting the adoption of cloud computing by public authorities.
· Updated EU roaming rules have delivered consumers substantial savings across a range of mobile roaming services, compared to 2007 prices. They also introduced structural changes to the roaming market stimulating competition in order to drive down consumer prices in the long term.
· Proposals on cross-border electronic signatures and on electronic identification are publicly discussed to ensure people and businesses can use their own national electronic identification schemes (e-IDs) to access public services in other EU countries where e-IDs are available. This would also create an internal single market for e-Signatures and related online trust services across borders, if agreed to ensure that these services will work across borders and have the same legal status as traditional paper based processes.

DANS: Professor Tauber, you claim that e.g. cloud services could suffer from insufficient technologies, and name LTE, Vector-VDSL and DOCSIS 3.0?

»The uninhibited upstream availability remains the bottleneck factor in all of these; especially shared media cannot be seen as providing future-oriented bandwidth at considerable conditions. On the contrary, only reliability as by FTTH can foster and guarantee countless functions from e-health to background m2m-surveillance and interactive e-learning to flourish.«[5]

Professor Hartwig Tauber, Director General, FTTH Council Europe

DANS: Mr. Brauckmüller, you advocate the constant evolution of communication technology to be demanding a better coverage in a highly covered area like Germany?

»The diversity of coverage is not a problem in Germany alone. The atene KOM was among the early promoters of broadband access oriented projects such as BIRD, Smart Cities, E-CLIC and now DANS. The sheer provision of access is not the only aspect – in consequence, services and demand also need to be seen as vital for a balanced welfare of the sector, to the benefit of economy, technology and society. A more pro-active approach to identify appropriate requirements on a smaller scale could help the DAE here to gain momentum.«

Tim Brauckmüller, managing partner atene KOM GmbH

[5] H.Tauber in: Breitbandkompass 2011 PLUS, Bundesverband Breitbandkommunikation, p.44f, Bonn, 2012

The Questionnaire

Within the limited period dictated by the cluster and the limited scope of awareness to be expected by the Digital Agenda still in a debating process at the outset of formulating the cluster application, the depth and statistic methodology were to remain appropriately adaptable in size and statistical validity to be relevant. The methodology was further developed. The communication initiative by the Commission had raised general awareness of the DAE on a wider scale than could possibly have been reached from the starting point of the DANS cluster. Hence as a reaction, further steps were cascaded: The questions were refined to provide indication on interrelation and ranking between DAE aspects, rather than a basic and global result. At the same time, the bias of individuals possibly engaging in more than one step of the cascade was neutralized.

The DANS questionnaire relates back to the three projects Smart Cities, CCC and E-CLIC, all originating in the INTERREG IVB NSR. The atene KOM GmbH was involved in various positions in the preceding projects and thus carried out his operation on behalf of the DANS cluster. In three steps, the questionnaire was tested among DANS partners, then in a refined version among partners from the former projects and finally in an operationalised online version among stakeholders addressed via the previous selection. This helped to coordinate within the cluster and gain confidence about the relevance of questions, but also to re-confirm about the »moving target« and the process as such. And it refined the pre-selected quorum, so to say as a panel of experts, to be approached. In fact, the initial set-up was significantly improved by the Commission's research in parallel, as this helped to focus on specific aspects, not addressed there. It also allowed the DANS questionnaire to be shorter and more focused.

The selection of addressees followed the cascaded approach, and in the third and final round, the former project partners disseminated the questionnaire's matured version to be replied to online.

The DANS questionnaire started with some simpler questions, also to stimulate continuation. It included however a wider range of open questions to gather the qualitatively best possible replies and collect comments. In total, more than 80 returns were received, many of which were entirely completed. By far the most of those missing an answer or two were still elaborate and very exlusive. The statistical relevance was thus baselined by the relative scope — each percentage of the statistical »population«, or short basis, is related to the total replies per question. Thus, while the basis varied, this methodology reflects the closest approximation to the quality of the quorum, being selected by the project partners to represent a scope of experts according to experts themselves.

The three projects represented in the cluster had to find a methodology to approach the potential of the DAE, in order to verify assumed discrepancies that had given reason for a region-specific cluster. The consortium assessed and discussed along the classical processes of analysing strengths, weaknesses, opportunities and threats. The best evaluation tool in this context was however seen in involving a wider scope of stakeholders, and this was decided to be realised by a questionnaire.

Two significant parameters were limited by the duration of the cluster and the topic itself: both methodology and statistical depth had to be drafted appropriately.

While the cluster would only run for a limited period, shorter even than the consultation phase of the DAE, this required a focused and timed process. Thus the response time from the cascaded questionnaire had to be cut off, while replies still trickled in. In return, the plan was to influence the discussion, before the DAE would be finally formulated and operationalised.

The Questions and Answers

Question 1 referred to general acquaintance with any of the three involved projects or their outcomes. More than 57% of the replies were affirmative, while only 10% stated their complete unawareness. In consequence, the basis can be referred to as in general familiar with the topic and the context of EU co-funded regional development. More than 57% of the quorum were familiar with one or more of the DANS cluster projects, but more than 37% replied not to know any of the DAE planned activities.

Question 2 asked more specifically about the three individual projects and the Citadel Statement (perceived as a key outcome of the Smart Cities project, involving the covenant of mayors). Replies confirming familiarity with either of the projects totaled between 35% and 55%, which puts the projects in some kind of an order. The single outcome was still known to more than 20%, but here more than 52% also replied not to have heard of it. In total, the replies put the Smart Cities project in a lead position among the three, but also reconfirm the figures returned to Question 1, with the majority familiar with the context.

Question 3 named the DAE; 45% of the replies stated familiarity but more than 37% negated it. So while the majority of the basis has both a connection to EU policy in general and a digital context in specific, the role of the overarching EU agenda is not present to the same extent. This could point to a communication deficit.
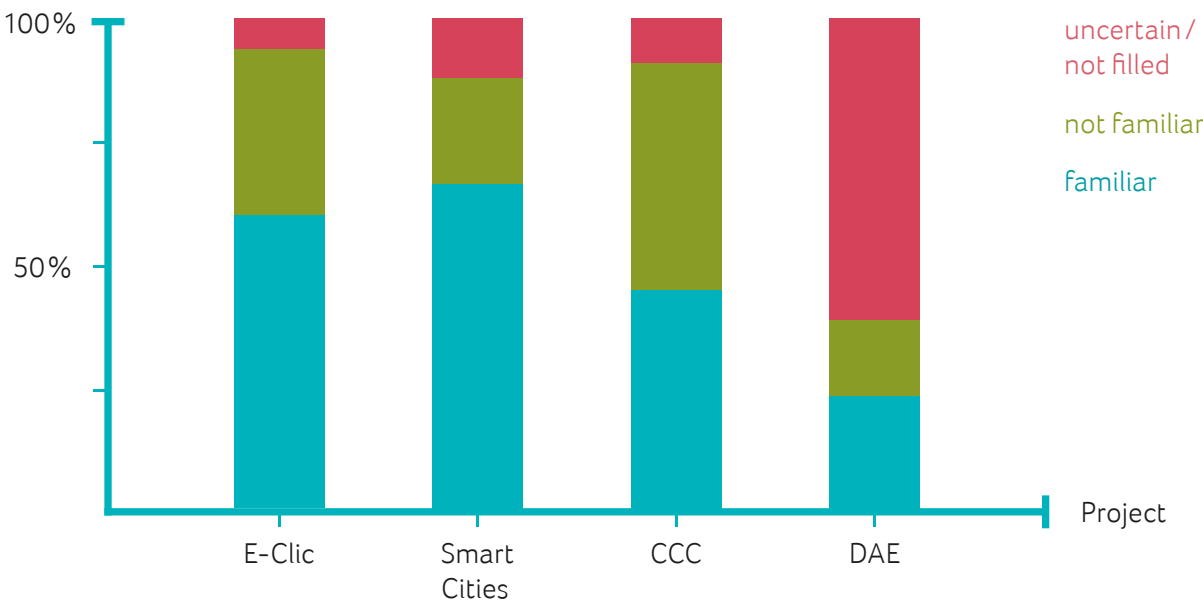
Questions 2 and 3: Familiarity with projects and the DAE

Question 4 requested to name any of the planned activities (eight at the time of the questionnaire) – 35% could name one or more, 65% did not reply to this question. This was considered an appropriate value for an agenda still under discussion.

Question 5 wanted the eight planned activities sorted after individual preference. The reply was from a statistical viewpoint to be an incomplete selection within a pre-selected quorum, but apart from this bias valid as indicating the order if differing from the DAE (as later re-confirmed in question 12). The order preferred by the participants was 2, then 3, 6, 8, then 7, 4, 1, and finally 5.

While none of the planned activities is left at their intended place, the key relevance appears to focus more on the applications than on the technical solution, and more on the consumer than on the provision side. This also matches well with the adjusted focusing as detailed in the DAE review published 18 December 2012.

Question 6 asked for a preference direction of implementation – would it be better to spread the DAE top-down, or implement it bottom-up. To this, around 34% preferred a bottom-up approach, 24% a top-down one, more than 41% did not reply. More than 27% gave additional comments. Among the comments the main argument was rather to re-act demand driven and thus legitimately, than to pro-actively invest into a market-dominated part of the ICT sector. Comments suggested that this aspect is a matter for differentiated consideration and rather individual situation assessment. In total, a considerable number of proposals included a combined option.

Question 7 wanted to collect methodological experience for assessing the best way to bring about changes in local, regional and national government to advance the aspirations of the DAE. The replies contained most often the terms cooperation and unity in approach, international projects to influence, justify and authorize the political process, approaches of inclusion and communication, reasonable advantages and measurable (sub) goals. In contrast, only a few comments suggested a review also to re-consider the coverage criteria.

»Do not wait for the market to bring NGA networks to less populated areas, but bring together the people in those less populated areas, and let them become an activist kind of group!«

Question 8 addressed this very conflict, a contrast in demand as well as supply of technological infrastructures (rather than services) between the urban and rural space. Replies focused on the regulatory process, such as conditional licensing, compensation schemes between more and less populated areas and the recognition of disparity. Among the proposals to activate the demand, most suggestions circled around the forging of alliances and joining into clusters, some suggestions included a scaled or stepped approach, e.g. via public institutions and services.

The Questions and Answers

Question 9 demanded to specify target groups for ensuring best possible DAE implementation, a selection that could consequently also be dissemination channels for the DANS cluster. The target groups identified ranged from age-clusters (mainly younger) to sectors (like regional and local policy, entrepreneurs) to single professions like teachers. In detail, also the following target groups have been mentioned: Non-users and digital illiterates, end users, rural communities and those who have digital barriers, major telecom companies (for regulation), the entrepreneurial and innovative sector and SMEs. In total, this wide field of in parts even contradictory replies seems not necessarily desperate or unspecific; correlations appear to exist with answers to the previous question. However, it would require a larger basis to achieve a statistical confirmation or value.

Question 10 asked to pinpoint the key aspects and planned activities of the DAE being most inspiring for regional development in the NSR. The shortlist prioritised the DAE core elements such as the digital single market, access guarantee, inclusion, security and balance, but also spin-offs like networking and the vitalization of the public management reform.

Question 11 went after bottlenecks for the implementation of the DAE. Most often named was funding, followed by lack of digital expertise and demand among users, but also required streamlining of administration and processes. Among the less multiple mentioned threats were the regional proliferation, a need for control (on various levels), interoperability issues, (too) little linkage between policy, knowledge and economy and the lack of infrastructure and access.

Question 12 was to an extent a contrast question to no. 5, asking to prioritise the planned eight activities by selecting and shortlisting the top three, under the aspect of »easiest to implement«. While the individual ranking was varied, the overall score supported and confirmed clearly favouring planned activity 8 (International aspects of the DAE), ahead of planned activity 2 (Enhancing the digital literacy, skills and inclusion), followed by planned activity 1 (Fast and ultra-fast internet access). None of the answers mentioned activity 6 (Trust and security) among the three planned activities that are presumably easiest to implement – perhaps an important selling point to be addressed.

»I would very much want to stress that the social contexts of people are very important; no support, no changes. Network-supported programs to enhance digital literacy, skill and inclusion should be prioritized.«

A final option to comment was used by a quarter of the participants. The comments pointed to the DAE related aspects and conflicts such as the level of bureaucracy, digital literacy, social inclusion, incentives, networking, business and thinking beyond technology. Main concerns lay with the funding and with common policies and priorisation among Member States, but also with the lack of persuasive examples of benefits for and in parts of an aging society.
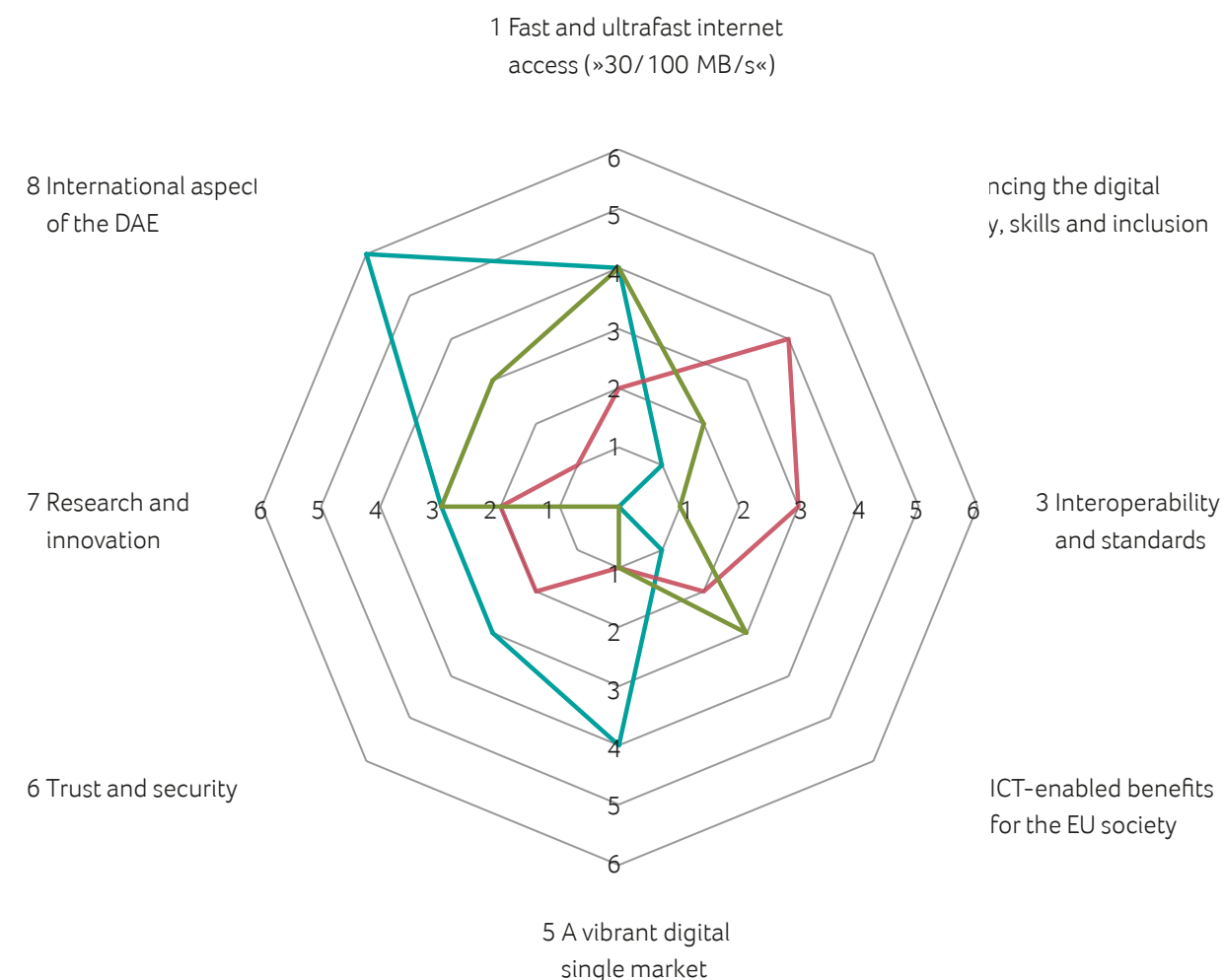
easiest to implement

second easiest to implement

third easiest to implement

Question 12: prioritise the planned eight activities according to their feasibility for implementation

Summary and Interpretation

The Questionnaire delivered a specific and detailed picture that correlates with the activities to hold public consultations and launch a review of the DAE – there appears to be potential for adjusting the focus and sharpen some of the intended processes, but at the same time the justification and public presentation of this political instrument is constantly challenged to attain acceptance and support.

For the North Sea Region, the economical and demographical, as well as the geographical and topographical specifics can be seen as influencing this acceptance and support. A wide array of conditions applies and shows as in earlier topical contexts that cohesion demands more than efforts, plans and (co-)funding. However, this funding, as discussed in the reviewed version of the Connecting Europe Facility (CEF) budget for telecommunication, appear to fall behind the DAE ambitions.

The NSR, while generally speaking to a larger part in the better-off economic situation, has to compensate between substantial discrepancies, mainly located along rifts between more and less inhabited areas. But it also shows a considerable variety of set-ups, political means and experiences regarding the privatization and deregulation of telecommunication. While the single market of this sector is hardly a near reality just as yet, the differences in success stories are as numerous as the protagonists. While certain approaches can already be determined as less vulnerable and more in line with good governance and subsidiarity, still bad business cases rarely turn around by mid-term subsidies alone.

Where asked about the DAE (and beyond the eight planned activities this also applies to aspects as prioritised now in the review version), stakeholders around the North Sea would emphasize a slightly more personalised, user-oriented focus, while the regulatory and technological background is understood to be rather a matter of business models and general political will. In this sense the questionnaire outcome shows strong endorsement for an overarching approach. At the same time, it demands to demonstrate more practical plausibility in a declaration of commitment. It underlines the importance of the participative momentum required for »selling« the effort's burden as necessary to the final beneficiary. The DAE is to communicate its benefits convincingly enough to effect wider adoption.

This brochure is intended to highlight the findings of the DANS online questionnaire – an INTERREG cluster project co-funded by the EU and involving partnerships and supporters from three successful projects around this topic: The Digital Agenda for Europe (DAE).

Different approaches to implementation from focuses like technology, services, data handling, but also individual demand, local networking and behavioural patterns provided a wide scope of expertise and qualified background to explore the DAE in relation to the specifics and requirements perceived around the North Sea. It appears imperative for a Europe of tomorrow, to continue the path of appropriate inclusion, be it in hierarchical administration of agendas or setting them into action. For the facets of future infrastructure as laid down in the DAE, the DANS cluster provides a valuable contribution to the debate on how best to accompany this along a regional development process.

Specifics for the North Sea Region have been identified, and are in principle not in contrast to the DAE as such. They indicate however – even in the light of a reviewed version of the DAE – that a robust mandate from the stakeholders requires both more appropriate communication and funding.