

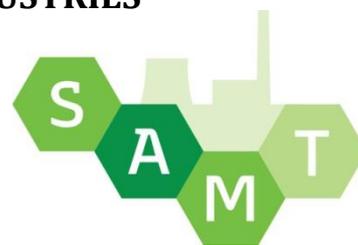
SAMT

SUSTAINABILITY ASSESSMENT METHODS AND TOOLS TO SUPPORT DECISION-MAKING IN THE PROCESS INDUSTRIES



COORDINATION & SUPPORT ACTION

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WWW.SPIRE2030.EU/SAMT

Deliverable 4.2

Summary of the dissemination activities

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**Abstract / Executive summary:**

The aim of the SAMT project (2015-2016) is to review and make recommendations about the most potential methods for evaluating sustainability and therein the energy and resource efficiency in the process industry. SAMT will collect, evaluate and communicate the experiences of leading industrial actors from cement, oil, metal, water, waste and chemical industry and review the latest scientific developments within the field of sustainability assessment. SAMT is a coordination and support action that will promote the cross-sectorial uptake of the most promising tools by conducting case studies, organizing workshops and producing recommendations for further implementation of the best practices in sustainability assessment.

Dissemination, and even more importantly, collaboration with stakeholders, has been an important part of the SAMT project. The aim has been to support learning, to maintain interaction with stakeholders, and to enhance knowledge transfer. This report summarizes the main dissemination and communication activities that have been carried out during the project.

The dissemination activities in SAMT include:

- three open workshops (June 2015, February 2016 and October 2016)
- public website <https://www.spire2030.eu/samt> that has been frequently updated
- dissemination of intermediate results in workshops and as publicly available project reports
- newsletters to inform about the progress of the project and upcoming events (November 2015, June 2016)
- participation in the events of the SPIRE community

During the project the focus has been on collaboration and interaction with stakeholders, in order to obtain inputs of industry practices and needs, to discuss the current challenges and to identify the most necessary and potential areas for co-operation and harmonisation. Based on this collaborative process the roadmap and the recommendations have now been formed. The project results will be further disseminated and exploited by all beneficiaries after the project has ended, for example through scientific publications and a press release.

KEY WORDS:

sustainability assessment, dissemination, communication, stakeholders, knowledge, exploitation

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1 Introduction

This report gives an overview of the dissemination activities carried out during the two-year project SAMT (Sustainability assessment methods and tools to support decision-making in the process industries). The internal working document D4.1 “Detailed dissemination plan” was compiled during the first project month and it formed an outline for the dissemination activities. The dissemination plan has been updated every six months. The dissemination plans have also been discussed and reviewed during the project meetings.

The SAMT project is a coordination and support action. Thus the focus has been on networking, sharing knowledge and identification of shared and diverse needs and interests among the stakeholders. Interaction with interested parties (instead of one-directional communication) has been emphasised and it has been essential for reaching the objectives of the project.

2 Dissemination objectives and plan

The overall objectives of the dissemination work package in the project are:

- To support learning and decision making of the industry by disseminating combined knowledge and best practices of the relevant energy and resource efficiency tools and indicators.
- To maintain interactive information flow to the industrial stakeholders, consumers, NGOs, SMEs and authorities in national and EU level throughout the project.
- To enhance knowledge transfer between the relevant stakeholders and the industry.

The most essential means for dissemination were defined in the project plan as milestones:

- M4.1 SAMT web-page ready
- M4.2 Open stakeholder workshop with WP1 and WP2
- M4.3 Open stakeholder workshop with WP2 and WP3
- M4.4 Open stakeholder workshop WP3 and WP4

Other planned means of communication included newsletters, presentations and other communication material, messages in social media and scientific articles.

3 Summary of the dissemination activities

3.1 Public website

The SAMT public website <https://www.spire2030.eu/samt> was created in the beginning of the project. The site is hosted under the SPIRE website. The project website is the most essential channel to inform about the events of the project, published results and other topical news. All public project reports have been made available for downloading on the website as soon as they have been finalised (*Deliverables* - four reports in December 2016, three more will be added in January 2017). Additionally, newsletters, invitations to the open workshops and other project news have been announced on the website (*News / Events* - altogether 16 news articles). The interactive visualisations of the methods and tools that were reviewed in work package 1 have also been published on the website (*Other Results*).

3.2 Project brochure and presentation materials

To support communication about the project and the ongoing work, a brochure presenting basic information about the SAMT project was made (Appendix 1). The brochure was also published on SAMT website (<https://www.spire2030.eu/sites/default/files/project/samt/uploads/Modules/Publications/samt-brochure.pdf>). Additionally, a basic presentation of the project was prepared in Powerpoint-format and distributed to beneficiaries through email and published on the website ([Introducing SAMT project](#)).

3.3 Workshops

The workshops of the project served as important forum for gathering, combining and disseminating knowledge and they provided possibilities for networking and learning. The workshops were open to interested stakeholders and parties outside the project consortium. Invitations to workshops were published through the SAMT website, SPIRE newsletters and website and sent by email to the contacts on project's mailing list.

3.3.1 1st open workshop in Wuppertal, June 2015

The first open workshop of the project was organized in Wuppertal, Germany, on June 2nd, 2015. The aim of the workshop was to discuss the methods and tools for sustainability assessment and the challenges related to applying them in practice. The workshop was co-organized by work packages 1 and 4. The workshop provided

- a brief introduction of the project,
- an update on available methods and tools,
- presentations of practical examples from different industrial sectors and
- a forum for discussion and networking.

Participants were engaged to discuss current best practices or good examples from different companies and industrial sectors in the small group discussions. 21 persons representing 17 organizations participated in the workshop. The discussions in the workshop provided valuable material for the work of work package 1 and the report D1.2. A memo of the workshop and a link to the presentation materials was sent to the workshop participants.

3.3.2 2nd open workshop in Bilbao, February 2016

The second open workshop was held in Bilbao, Spain, on February 17th, 2016. The aim of the workshop was to present and discuss the case study framework, to draft a vision for developing a harmonized roadmap for sustainability assessment and to provide a forum for discussion and networking. There were 27 participants representing 19 organizations in the workshop. The workshop programme comprised of

- a brief overview of the project results of the first year,
- overview of the case studies, presentation of the water footprint case study,
- presentation of the integrated case study,
- presentation of the simulation study and
- group discussion.

After the presentations the participants were divided into two groups with a task to discuss and define a vision for developing and implementing consistent sustainability assessment methods in the process industry. Based on the material from the vision building group work in the workshop and the project findings gained so far, a first version of the SAMT roadmap was drafted. During this process the vision 2030 -statement took the following form:

“Sustainability assessment provides additional value for industrial decision-making. Related methods are widely integrated in industrial activities, promoting competitiveness, sustainability, co-operation and data exchange within and between sectors and value chains.”

The draft vision and roadmap were sent to the workshop participants for comments. A news article about the workshops providing links to the presentation materials was published on the project website.

3.3.3 3rd open workshop in Brussels, October 2016

The third open workshop was organized jointly by the SPIRE projects SAMT and STYLE. The workshop was held in Brussels, Belgium, on October 6th, 2016. Within the workshop, the findings of the both projects were summarized and a draft of a harmonized roadmap for sustainability assessment was presented. The workshop provided stakeholders a final opportunity to influence the outcome of the projects: recommendations to the European Commission for future development needs. There were 60 participants representing 46 organizations in the workshop.



Figure 1. Participants in the 3rd open workshop in Brussels 6.10.2016

The programme of the workshop comprised of

- presentations of SAMT and STYLE projects and their recommendations,
- commentaries by invited speakers Dana Kralisch (coordinator of the MEASURE project) and Soren Bowadt (Programme Officer responsible for SPIRE),
- cross-sectorial roundtable discussion with representatives of different process industry sectors, and
- feedback session with posters on selected themes.

The SAMT presentation included highlights from the project findings and an introduction to SAMT vision and roadmap building. Furthermore, the preliminary recommendations of the project were presented. It was emphasised that the roadmap building is a participatory process and the participants of the workshop were encouraged to give feedback. The presentation materials were sent to the participants after the workshop and it was reminded that feedback is welcome.

3.4 Press releases

A press release describing the objectives of the project was published on June 15, 2015 ("[SAMT project: Identifying best practices for evaluating sustainability](#)", or see appendix 2 for the full text). The aim was to raise awareness of the topics relevant to the project, to inform of the ongoing work, and to reach to potential stakeholders on a wider scale.

Another press release, summarizing the main final outcomes and conclusions of the project, is being prepared and will be published in January-February 2017.

3.5 Newsletters

Project newsletters have been compiled to inform about the progress of the project, results of the project and past or upcoming events. The newsletters have been published on the project website and they have been sent by email. The project's mailing list comprised initially of the project partners' contacts and respondents of a survey relating to the project topic but the list has been gradually complemented with email addresses of workshop participants and people who have requested information about the project or otherwise been interested in the project. In December 2016 the list includes 170 email addresses.

The first newsletter of the project was sent on November 11th, 2015. The Newsletter 1 (November 2015) can be accessed via the following link:

<http://newsletter.vtt.fi/a/s/66287501-daa9b852cf26da0ef6cb10a775d14459/993328/>

The second newsletter was sent on June 15th, 2016. The Newsletter 2 (June 2016) can be accessed via the following link: <http://newsletter.vtt.fi/a/s/66287501-8279b27f916b8040a1c7f234f1c0ee78/1239861>

The third newsletter of the project will be sent in January 2017.

3.6 Scientific publications

A joint conference paper was prepared in collaboration between the projects STYLE, MEASURE and SAMT for the 10th International Conference on Society & Materials (SAM10):

Peace, A., Coleman, N., Sfez, S. & Pihkola, H. (2016). **Evaluation tools for sustainable process industries.** The conference took place in Rome on May 9-10, 2016. The paper was presented by Amy Peace, the coordinator of the STYLE project.

A joint presentation by SAMT, STYLE and MEASURE regarding the conclusions and recommendations from SPIRE-4 projects will be prepared for the 8th International Conference on Life Cycle Management (LCM) 2017. Further two abstracts basing on the outcome of SAMT are being prepared for the LCM 2017. The abstracts will focus on the following conference topics:

- Improving interpretation, presentation and visualization of LCA studies for decision making support
- Potentials and limitations of combined life cycle approaches and multi-dimensional assessment

The deadline for the abstracts is January 15, 2017. The conference will take place on September 3-6, 2017 in Luxembourg.

Additionally, two open access journal publications are planned to be published during 2017.

3.7 Other dissemination activities

SAMT project has been presented in the SPIRE events *SPIRE impact workshop* in April 2015 and in *SPIRE 2014 project introduction event* in June 2015. A brief presentation video of the project was filmed during the latter event and it was published on YouTube: https://www.youtube.com/watch?v=itX5I_2JINs. Information about approaching SAMT workshops has been disseminated through the SPIRE newsletters and distribution lists.

Collaboration with the two other SPIRE-4 projects focusing on sustainability tools and methods, STYLE and MEASURE, has been active. SAMT representatives have participated in the workshops of the STYLE and MEASURE projects (March 2015, October 2015, March 2016), and similarly STYLE and MEASURE representatives have taken part in the SAMT workshops. The collaboration with the STYLE project was further enhanced towards the end of the project through a joint industrial experience exchange meeting in June 2016 and the joint final workshop in October 2016.

A LinkedIn-group was established for the project in March 2015. The aim was to reach through the social media network a larger audience for the dissemination activities than would be otherwise possible. There are twelve conversation articles in the group. 16 persons apart from the organisations in the consortium and the participants of the workshop have joined the group (altogether 39 members).

Originally use of Twitter for communication was also planned for the project. However, that was discarded since no one in the project team was otherwise active in Twitter. Number of followers to be easily reached and opportunities to interactive communication would have been low.

The project partners, both industrial and RTOs, have actively introduced the project and its outcome in various events. For example, the project was briefly presented in LCM 2015 conference and on the website of the European Aluminium association. The industrial partners have also emphasised need for internal

dissemination in their organisations. Therefore also the frequent project meetings, case studies and discussions between the project partners have formed an essential part of the dissemination activities.

A stakeholder panel comprising of representatives of other relevant stakeholder organisations than the beneficiaries was formed in the beginning of the project. According to the project plan the stakeholder panel should consist of external experts representing industries, policy makers and non-governmental organizations and it would provide feedback on the evaluation of sustainability assessment methods and support the dissemination activities. The panel does not have a decisive role in the project. Nine persons representing three industrial organizations and four associations or platforms joined the stakeholder panel. However engagement of the stakeholder panel into the project failed. The workshops were the main collaborative events of the project and they provided a lot of inputs from many types of stakeholders. Unfortunately the members of the stakeholder panel were not able to participate in the workshops. Also the industrial partners of the project (and sister projects STYLE and MEASURE) formed a strong and active representation of the stakeholders, and thus the panel was not eventually regarded significant. The panel members were included in the projects' mailing list and therefore have received all the workshop invitations, announcements and newsletters of the project, and some enquiries for feedback.

4 Conclusions and future work

4.1 Main conclusions

The key tools in dissemination during the project have been the open workshops focusing on industry needs and practices, the frequently updated website with all project deliverables available and close collaboration among a large group of stakeholders. The emphasis during the project has been on collaboration, identification of the most potential areas for cross-sectorial harmonisation and developing a joint vision and recommendations. The dissemination activities have been aligned accordingly, aiming to gather inputs, to maintain dialogue and to support learning and knowledge sharing. It turned out that a complementary stakeholder panel was not so crucial for reaching stakeholders, since valuable contributions were gained during the project beyond the panel through active interaction between stakeholders representing numerous sectors and various types of organisations broadly. Apart from external dissemination, the industrial partners of the project also emphasised the need for internal communication in their organisations and have utilised project outcome for those purposes.

As a result of this participatory process the recommendations and the implementation strategy have now been refined into a form that has gathered wide acceptance and are regarded as relevant among the stakeholders. The intermediate results have already been introduced and discussed several times during the process but effort needs to be put on further dissemination and exploitation of the finalised results and conclusions. The project partners are committed to continue dissemination even after the project has ended. A plan for dissemination activities for the year 2017 was outlined in the final project meeting on December 1st 2016 (see the following section).

4.2 Planned dissemination activities for 2017 and exploitation of the results

Material to support dissemination activities by all project beneficiaries will be produced in January 2017. A SAMT newsletter 3 (January 2017) will summarise the final results of the project and provide links to the project reports. The newsletter will be published on the project website and it will be sent by email.

An animated video presenting the aims, the approach and the vision of the SAMT project is being finalised. It will be published on the project website and on YouTube in January 2017. The video can be used as a general introduction to the topic and it can be followed by a presentation focusing on the relevant project results for the event in question.

A brief slide set presenting the main results of the project will be prepared in order to facilitate project presentations by project beneficiaries in various events. The slide set will be sent to project partners as powerpoint-file so that they can easily modify the presentation to be better suited for the target audience.

In addition to publishing all public project reports on the project website, the report D3.3 “Sustainability assessment in the process industry – Future actions and development needs” will also be published in VTT’s publication series in January 2017. This will give the document a permanent link as it will be included in VTT’s publication open access archives. VTT publications database is also available via WorldWideScience WWS, the global portal of science and research publications.

A press release presenting the main conclusions and recommendations of the project will be published in January 2017.

One joint presentation by the SPIRE-4 projects MEASURE, STYLE and SAMT and two abstracts basing on the SAMT project results are being prepared for the Life cycle management research conference (LCM) 2017. Journal articles will also be aimed at to be published during 2017.

The results of the project will be exploited in practical sustainability assessment work, in standardisation initiatives and as a basis for preparation of research and development projects and programmes.

Appendices

1. SAMT project brochure
2. SAMT Press release 15.6.2015



Sustainability assessment methods and tools to support decision making in the process industries (SAMT)

The aim of the SAMT project is to review and make recommendations about the most potential methods for evaluating sustainability in the process industry, focusing especially on energy and resource efficiency. SAMT will collect, evaluate and communicate the experiences of leading industrial actors from cement, oil, metal, water, waste and chemical industries, and review the latest scientific developments within the field of sustainability assessment. A central outcome of the project is a strategy for implementing best practices across different sectors of the process industry.

SAMT is an EU funded project under the SPIRE Public Private Partnership (PPP). SPIRE PPP brings together several sectors of process industry: cement, ceramics, chemicals, engineering, minerals and ores, non-ferrous metals, steel and water. All SPIRE sectors can be considered as resource and energy intensive. Improving resource and energy efficiency are urgent issues for the sustainability and competitiveness of the sectors.

Within the Horizon 2020 work programme, the specific and common goals listed for the SPIRE sectors are:

- A reduction in fossil energy intensity of up to 30% from current levels by 2030.
- A reduction of up to 20% in non-renewable, primary raw material intensity compared to current levels by 2030
- A reduction of greenhouse gas emissions by 20% below 1999 levels by 2020, with further reductions up to 40% by 2030.

For evaluating the current state and the achievement of the goals, sustainability assessment methods, tools and indicators that are applicable for cross-sectorial assessment are required.

SAMT is a coordination and support action that promotes cross-sectorial learning and uptake of the most promising methods and tools by conducting case studies, organizing workshops and identifying needs for future R&D and standardization.

SAMT actions

- Overview of the existing sustainability assessment methods and tools
- Interview study on the industrial practices
- Open workshops bringing together representatives of several process industry sectors
- Evaluation of the applicability of the methods and tools in industrial case studies and in cross-sectorial analyses
- Defining a roadmap and an implementation strategy for further uptake of the methods and tools
- Overview of relevant standardization activities



SAMT – Sustainability assessment methods and tools to support decision-making in the process industries

www.spire2030.eu/samt

Outcome of the project

1. Identification of best practices for evaluating resource and energy efficiency
2. A strategy for implementing best practices across different sectors of the process industry
3. A roadmap for dissemination and R&D
4. Recommendations for future research and cross-sectorial assessment
5. Input for future standardization

SAMT consortium

Partners working in the SAMT project are

- VTT Technical Research Centre of Finland Ltd (coordinator)
- Fundacion Tecnalia Research & Innovation
- Wuppertal Institut für Klima, Umwelt, Energie GmbH
- CEMEX Research Group AG
- SUEZ environnement
- Neste Corporation
- Bayer Technology Services GmbH
- BASF SE
- Hydro
- Asociación Española de Normalización y Certificación (AENOR)

The consortium is complemented by a cross-sectorial stakeholder panel in which the following organisations are represented: ACCIONA Infraestructuras, Thyssen Krupp, Spanish Chemical Industrial Association, Ihobe, WssTP, the Chemical Industry Federation of Finland and UPM.

More information about SAMT project and ways to follow its progress

- Visit our website at www.spire2030.eu/samt
- Follow SAMT group in LinkedIn
- Join the stakeholder panel
- Participate in our open workshops (1st in June 2015, 2nd in February 2016 and 3rd in October 2016)
- Contact project coordinator and ask for more information

All deliverables are published on the project website. Final results will be available in December 2016.

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PRESS RELEASE 15.6.2015

SAMT project: Identifying best practices for evaluating sustainability in the process industry

The SAMT project of the European Union will work together with leading industrial actors from the cement, oil, metal, water, waste and chemical industries and review the latest scientific developments within the field of sustainability assessment. In the first phase of the project, a total of 90 methods and tools were reviewed. In the second phase, the best performing methods and practices will be tested with real-life case studies.

“The industries can learn from each other by sharing information on their methods and tools to evaluate sustainability. The SAMT project is offering this possibility for process industries operating in different fields by organizing workshops and conducting case studies”, says coordinator of the SAMT project **Tiina Pajula** from VTT Technical Research Centre of Finland.

Most of the process industry sectors are resource and energy intensive by nature. In the European Union’s research programme Horizon 2020, process industries share ambitious goals in reduction of fossil-energy intensity, greenhouse gas emissions and intensity in using non-renewable, primary raw materials.

“Sustainability assessment is increasingly important within European projects and society as a whole in order to establish a basis for the environmental impact of manufacturing. As such, it is a core part of the SPIRE vision for the Sustainable Process Industries“, emphasizes **Søren Bowadt**, Programme Officer from European Commission.

For the process industries, sustainability assessment methods are crucial for evaluating and communicating the current state and the achievement of the goals related to resource and energy efficiency. The SAMT project will provide an unbiased, independent review of the life cycle based sustainability assessment methods and tools, and the identified best practices will serve as a benchmark.

“The evaluation methods and tools are improving all the time. Neste is a leading company in production of renewable diesel and a forerunner in circular economy in production of fuels. Therefore it is important for us to thoroughly know all the impacts of our products during their life cycle – and also the methods in evaluating them”, says **Pekka Tuovinen**, Director in Sustainability from Neste.

“In addition to consistent and innovative solutions, our customers are looking to contribute to a more sustainable future where being environmentally and socially responsible goes hand in hand with running a profitable business. Therefore, BASF has embedded sustainability in its corporate purpose, and linked this ambition directly to business factors”, states **Peter Saling**, Director in Sustainability Methods and Sustainability Strategy of BASF. “The SAMT project is an interesting platform to learn and discuss other companies’ views on this topic as well as an opportunity to exchange good practices”, Saling continues.

“The linear growth model linked to linear produce-consume-and-throw consumption practices is close to its end. It is necessary to accelerate the development of a sustainable model, for more long lasting and harmonious growth. For more than ten years, sustainability assessment tools and Life Cycle Assessment approaches are helping SUEZ environnement, its partners and its customers to make more sustainable choices“, says **Paul-Joël Derian**, Senior Vice President Research, Innovation & Performance of SUEZ environnement.

The first open SAMT workshop took place on 2nd of June at Wuppertal, Germany, where industrial actors and researchers gathered to discuss current best practices and challenges in applying sustainability assessment methods in practice. The second open workshop will be held next year, on February 17th at Bilbao, Spain, to discuss the findings of the industrial case studies.

The project will publish its results including identification of the best practices, cross-sectorial guidance and recommendations for future actions in October 2016.

Partners working in the SAMT project are CEMEX Research Group AG, SUEZ environnement, Neste Corporation, Bayer Technology Services GmbH, BASF SE and Norsk Hydro ASA, VTT Technical Research Centre of Finland Ltd, Wuppertal Institut für Klima, Umwelt, Energie GmbH (Germany) and Tecnalía (Spain). Spanish National Standardization Body (AENOR) acts as an expert for standardization.

SAMT is one of the three projects funded under the SPIRE Public Private Partnership to coordinate studies related to sustainability assessment in the process industries.

SAMT project: <http://www.spire2030.eu/samt/>

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