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Mapping Report for Sofia Municipality

Adapted extract from the original deliverable 2.1

"Map on stakeholder relationships and interdependencies and report on stakeholder need, interest, power and influence"



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 101006439

Important note: This document is an adapted extract from deliverable 2.1 "Map on stakeholder relationships and interdependencies and report on stakeholder need, interest, power and influence", published in June 2021 <https://www.rri-leaders.eu/wp-content/uploads/2021/07/D2.1-Map-on-Stakeholder-Relationships.pdf>

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This publication has been produced within the framework of the RRI-LEADERS project, funded by the European Union's Horizon 2020 research and innovation programme, under grant agreement No 101006439.

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Mapping Report for Sofia Municipality

Sofia Municipality: introduction and policy focus



*Coat of Arms of Sofia
and the motto 'Ever
Growing, Never Aging'*

Sofia, the capital of Bulgaria, is one of the oldest cities in Europe with more than 7000 years of history. It was established at the crossroads of very important routes, linking Western Europe with Asia Minor and the Middle East, as well as the Baltic Sea with the Aegean Sea. Serdica, Sredets and Triaditsa are the three old names of the city. The new name Sofia was mentioned for the first time in a document, dating back to 1376. In 1382, after a three-month siege, the city was conquered by the Ottomans. In 1879, one year after the liberation of Bulgaria from Ottoman rule, the First Constituent National Assembly unanimously voted Sofia for the capital of the restored Bulgarian state.⁵

Today, Sofia is the largest city in Bulgaria – it accommodates the legislative, executive and judiciary power in the country (National Assembly, Presidency, Council of Ministers and all Ministries) and it is the financial, educational, cultural, business and commercial centre of the state. Sofia is the 15th largest city in the European Union with the population of approximately 1.3 million (1.6 million with the surrounding region), which is 23% of Bulgaria's population. Also, Sofia accounts for 25% of the labour force in the country.⁶

According to the National Statistical Institute, Sofia's GDP is € 22.7 billion and GDP per capita is € 17,097. Sofia accounts for 40% of the national GDP, 1/3 of the export from Bulgaria and 1/6 of manufacturing. Leading sectors in the city include ICT; trade and repairs; creation and distribution of information and creative products, telecommunications; manufacturing; transport, storage and post; administrative and supporting activities; professional activities and scientific research; construction; hotels and restaurants; healthcare and social work; real estate; generation and distribution of electricity, heating and gas. Furthermore, Sofia offers one of the highest Internet speeds in Europe and has a very vibrant and innovative start-up and entrepreneurial ecosystem, which has been developing rapidly in recent years. As a result, the ICT sector became one of the priority sectors, accounting for 19% of the economy of the city. Sofia is also a growing Fintech and artificial intelligence destination and ranks among the top 3 global service locations in Central and Eastern Europe, as it has a very well-developed business process outsourcing (BPO) and shared services centres (SSC) sectors. Other high-tech sectors in Sofia include creative industries, the film industry, the gaming sector, the automotive, robotics and aerospace sectors. Sofia has more than 35 tech, art and social co-working spaces and hubs.⁷

By the end of 2018, Sofia has been attracting half of the foreign investments in Bulgaria – EUR 12.4 billion or EUR 9,800 per resident, which is three times the average for the country. A big share of the investment is

⁵ Official website of Sofia Municipality, available at: <https://www.sofia.bg/en/web/sofia-municipality/history>

⁶ *Sofia Business Guide* by the 'Digitalization, Innovation and Economic Development' department of Sofia Municipality, available online at: https://innovativesofia.bg/wp-content/uploads/2020/03/Business-Guide-2020_English_web.pdf

⁷ Ibid.



allocated to high value-added sectors, because Sofia tries to encourage projects in the fields of R&D, biotech, creative industries, high value-added manufacturing and technologies for sustainable city development. The city is currently building four new industrial zones, suitable for strategic investors. In addition, there are 10 operating business zones in the city as well as a science and technology park with 11 high-tech laboratories, focusing on IT, life sciences and green energy.⁸

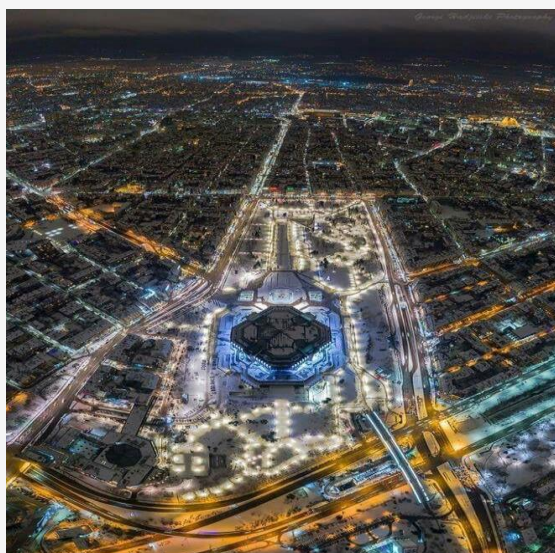
Regarding education, there are ~100,000 students in Sofia, studying in 23 universities, among which are the oldest higher educational institution in Bulgaria – Sofia University St. Kliment Ohridski, established in 1880, the University of National and World Economy, the Technical University – Sofia, the Medical University, the Bulgarian Academy of Sciences and the Agricultural Academy.



Sofia University "St. Kliment Ohridski"

There are also 63 research centres and more than 30 independent IT schools. More than half of Sofia's population has a university degree and speaks either English, German or Russian. 1/3 of the people between 19 and 34 are proficient in more than one foreign language.⁹

The city has a well-developed transport infrastructure, including buses, trams and subway. Sofia Airport, the largest international airport in the country, is about 20 minutes away from downtown Sofia.¹⁰



Sofia at night

Policy areas in the focus of RRI-LEADERS project

Sofia Municipality is committed to creating strong innovation eco-systems in order to transform the city of Sofia and surrounding communities into smart and sustainable places where people enjoy living and working. To achieve these goals, concerted efforts and investments are needed not only from the city administration but also from key stakeholders and partners from the industry, research and academia, civil society organisations and citizens.

The ambition is to build Sofia as an innovative city that employs digital technologies, policy and financial instruments to improve the efficiency of urban operations and public services, the economic, social, and

⁸ Ibid.

⁹ Ibid.

¹⁰ Ibid



cultural environment, citizen well-being and quality of life, while ensuring that the needs of present and future generations are met in an equitable manner.

These objectives are defined in key strategic documents of the city, namely, the *Innovation Strategy for Smart Specialisation of Sofia*,¹¹ the *Strategy for Digital Transformation of Sofia*¹² (adopted in 2020), *Sofia Youth Strategy 2017-2027*¹³, and the *Vision for Sofia 2050*,¹⁴ which outlines the priorities for the development of Sofia and its suburban areas until 2050.

The four policy areas, chosen by the Sofia Municipality for the RRI-LEADERS project are fully in line with these strategic documents. The policy areas include: 1) support for innovations, 2) digital transition and new skills, 3) youth employment and entrepreneurship, and 4) sustainable urban development.

Through the RRI-LEADERS project, Sofia Municipality expects to get support from the European and local partners for the identification, development and implementation of measures and procedures. The aim is to transform research and innovation in such a way that responsibility becomes an institutionalised ambition and leadership priority for the city authorities, encouraging societal change-driven policy making and sustainable governance in an anticipatory and inclusive way.

Interviews with stakeholders in Sofia Municipality

26 interviews in total were conducted in Sofia, with representatives from municipal and state administration, non-governmental organisations, research and academia, as well as the business sector. The interview questionnaires were adapted to the policy topics chosen for Sofia Municipality, namely youth employment and entrepreneurship, support for innovation, digital transition and sustainable urban development. The findings of the interviews are summarised in three sections, per quadruple helix partners: research and academia, policy makers and NGOs, and business.

Research and Academia

Interviewees included representatives from four universities and one research institute of the Bulgarian Academy of Sciences. All interviewees were well aware of the RRI policy framework, which they consider of high relevance to research and academia organisations. Although internal organisational policies or strategies focused on the complete RRI framework are not developed, all interviewees indicated the availability of in-house policies on some of the RRI keys. Still, the embeddedness of the RRI individual keys varies across organisations.

Responsibility in research and innovation is understood broadly as responsibility to the society at large, and thus linked to the positive impact of R&I activities and their results on society and the environment.

¹¹ https://www.sofia.bg/documents/20182/448750/ISIS_Sofia.pdf/f51fcd5a-2973-4679-89fe-62b3dccb6662 (in Bulgarian)

¹² <https://innovativesofia.bg/en/strategies-and-policies/>

¹³ https://www.sofia.bg/documents/20182/448750/Strategy_young_people-SO-2017-2027.pdf/8186ee54-8135-42e0-bfa2-17dd2b281742 (in Bulgarian)

¹⁴ <https://vizia.sofia.bg/vision-sofia-2050/>



Responsibility is further expressed in the collaboration of multi-disciplinary teams, knowledge management and use of research results to the benefit of society.

Regarding the RRI keys, open access and research ethics/research integrity are the most important keys as per the interviewees from research and academia. According to them, most of academic/research publications are of open access and published in open-access repositories of scientific research. Open access is one of the indicators, established by the Ministry of Education and Science for the assessment and ranking of Bulgarian universities and research organisations, and all national programmes for scientific research require open access for publications and research results, which in itself is a strong driver. However, the high fees for open-access publishing in professional journals are a strong barrier before the Bulgarian research and academic community. Another issue related to open-access publishing of research results is the need for proper knowledge management, fair use of results from scientific research, and respect of intellectual property rights. In regard to open-access to research data, there is a recognised need for establishment of common standards for the collection of research data.

Research ethic/integrity is implemented according to the national legislation. Specific in-house policies or procedures on research ethics/integrity are not available in all organisations as per the interviewed. In some cases, the staff is encouraged to abide by the European Charter for Researchers.¹⁵ Recently, ethical issues have gained prominence regarding the way research activities are conducted, and the need to avoid research which could have a negative impact on society and environment.

All interviewees were of the opinion that gender equality has never been an issue and universities and research organisations are well positioned in this regard. When it comes to gender equality and other aspects of non-discrimination, these are mandatory principles and thus perceived as a norm by the research and academia community.

Stakeholder engagement has made visible progress in the recent years. Most of the interviewees noted that external stakeholders are consulted in the elaboration of their university curricula and setting up research agendas. However, engaging with citizens and civil society organisations in setting up research agendas has not been reported by the interviewees, although deemed necessary, given the responsibility of science to address societal issues.

Science education is perceived by some respondents as STEM (science, technology, engineering and mathematics) and more broadly by others as STEAME (science, technology, arts, engineering and mathematics, as well as entrepreneurship). Diverse objectives and practices were presented during the interviews: involving university students in projects and accreditation procedures, focus on life-long learning, cooperation of institutes of the Bulgarian Academy of Sciences with high schools in projects, thus actively including science and research departments in STEM education in schools, and some noted offering of training courses to working adults who want to continue their education. Most of the respondents were of the opinion that science education will be of critical importance for the future to build societal resilience to respond to crises like the Corona virus. Interviewees also marked areas for improvement in science education, in particular, the work with teachers and educators. Interviewees further noted that entrepreneurship and technology will be

¹⁵ <https://euraxess.ec.europa.eu/jobs/charter/european-charter>



critical for the future. Another critical issue are the open educational resources, in particular their use, distribution, funding and accessibility to the wider public.

The biggest challenges and barriers to the integration of RRI principles in research and academia organisations are:

- Lack of wider awareness on the RRI policy framework among the staff of research and academia organisations. RRI is known mostly by those who have participated in FP7 and Horizon 2020 projects or are currently participating.
- While RRI is perceived as a driver for change, the mindset and the outdated models of education are impediments instead.
- The bottom-up process of decision-making in academia makes it difficult for good ideas for innovation to get to the top level and get implemented.
- Barriers to open science and innovation: the current public procurement system is ineffective and does not support the uptake of innovations.
- Science-business collaboration is a continuing issue. Businesses rarely approach universities with a proposition to conduct research for them and they are not very open for cooperation with researchers and universities.
- Engaging with citizens and civil society organisations in setting up research agendas is not practiced by research and academia organisations.
- Gender equality is narrowly understood in terms of close-to-equal numbers of men and women.

Anticipation, inclusiveness, reflection and responsiveness (AIRR dimensions)

The interviewees from research and academia considered the AIRR dimensions of relevance to their organisations.

Anticipation is mostly expressed in developing and implementing internal strategies for education and/or research which are aligned with relevant national and EU strategies, and in some other cases in updating and adapting the educational programmes and curricula. Systematic analysis of social impacts is mainly done by researchers, but anticipation approaches like foresight studies or horizon scanning were not reported by the interviewees.

Reflexivity is mostly in the form of periodic reports to the Ministry of Education and Science which are delivered as per the requirements of the annual national university rating system. The respondents also noted that the universities in principle are adaptive and react to changes in the external environment. For example, it was noted that many current research projects deal with different aspects of digitalisation (human resources, new international business realities, new business trends), so priorities and work methods change to be “up-to-date”.

Inclusiveness is mostly focused on engaging with external experts (businesses, policy makers) and the research and academia community. Engaging with citizens is not practiced, although considered to be of high importance by the interviewees. Citizens are usually involved as research subjects but not engaged in discussion panels, participatory workshops, science-café events, etc.



Policy makers and civil society organisations

Six interviews were conducted with representatives of policy makers and seven interviews were conducted with representatives of non-governmental organisations.

Although all interviewees recognised the high relevance of the RRI policy framework to their work and organisations, internal policies on the complete RRI framework or on its individual keys (i.e. strategies, action plans, etc.) were not presented.

Public engagement and open access are the most relevant and important keys to both policy makers and civil society representatives. According to some of the interviewees, the engagement of more institutional actors in policy making implies sort of a ‘public contract’ between the various stakeholders, in terms of shared responsibility, transparency and accountability. In regard to **public engagement** the interviewees (from policy making and civil society) emphasised on the following issues:

- It is very important to include citizens in the design of policies and the elaboration of long-term policy visions, so that a social consensus can be achieved through discussion of different views and ideas.
- Inclusion of citizens should happen through (i) citizen associations and groups, but also through (ii) direct engagement of individual citizens.
- Sofia Municipality already has many online mechanisms for consultation with citizens, but more can be done to optimise the processes.
- Public engagement should not be understood as a one-way channel to provide only information to citizens. Feedback by the citizens in the policy-design process is very important as well.
- In regard to responsibility of local governments, it was noted that they need to stay tuned to what citizens say and align their priorities to those of the public and the business.
- Similar to the group of research and academia, public engagement is understood as stakeholder engagement by some of the interviewees.
- Public engagement is crucial for creating proper conditions for the development of policies. Public participation should be a guiding principle in policy-making, policy implementation and in elaborating solutions. Citizen participation on all levels of governance, from policy development to decision-making, is perceived as a guarantee for transparent and good governance.
- Some of the interviewees from NGOs actively engage the citizens in public discussions, public fora, and advocacy to local government for carrying out public consultations.
- Good example of public engagement was presented during the interviews, namely the process of developing the Digital Transformation Strategy for Sofia Municipality, during which consultations with over 100 stakeholders have been organised and the Strategy has been as well validated by consultations with citizens.

Open access has a key role as it gives legitimacy to the policies and is further considered a key factor for innovation and development. The interviewees emphasised that the sharing of data and information is a driver to accelerate progress and innovations. The easier the access to data and information, the larger the capacity to design, implement and participate in development of policies and processes.

Science education is considered of high importance for the future development of Sofia, by interviewees from both policy-making and NGOs. There was an opinion that it has to start at the most basic level of education,



including kindergartens and pre-schools, which would be easy to achieve in Sofia. Science education is considered more broadly than STEM to include life-long learning, entrepreneurial, leadership and other soft skills. Another argument to support the importance of science education is that policies have to be developed on the basis of scientific data. Today information and expert knowledge are more important than ever, and science needs to be integrated into the educational process as well.

Most of the interviewees from the non-governmental organisations noted that their organisations have internal **ethics codes and policy for non-discrimination**, which are binding for the staff. In some cases, the ethics code is binding as well for partners and beneficiaries.

Gender equality is considered important regardless of the field of work, but does not appear to be an issue in Sofia. Again, the general understanding of gender equality was confined to the equal numbers of men and women in the organisations, and/or the representation of women in leadership positions.

Anticipation, inclusiveness, reflection and responsiveness (AIRR dimensions)

Anticipation is perceived to be of high importance as it allows for short- and long-term planning, and quicker response to unpredictable situations. Two examples were given as good practices in regard to anticipatory governance: Digital Transformation Strategy of Sofia and Vision for Sofia 2050 that looks at development of Sofia in 9 different aspects. Anticipation is considered critical for the long-term municipal policy of youth employment and entrepreneurship on the one hand, but on the other hand the local administration's approach is focused on short-term models of policy development and data analysis.

There are internal procedures for self-assessment at the Sofia municipality, but they vary in different departments and municipal units. These procedures are often updated to include new indicators for control of quality and effectiveness, and for process monitoring. One of the main goals of Innovative Sofia is the digitalisation of these processes, which are expected to improve the self-assessment and reflexivity.

Inclusiveness is also very important, because all relevant stakeholders need to be involved in the policy design in order to develop feasible policies. Inclusion is perceived as a continuing process in the whole policy cycle – from generation of ideas and development of policies to their implementation. The interviewees presented different approaches to inclusiveness applied by their organisations. Public consultations, focus groups and open days are widely used by some Directorates of the Sofia Municipality.

The processes of engaging and consulting citizens, experts and stakeholders during the elaboration of Vision for Sofia 2050 is an excellent example of inclusiveness. More than 400 multidisciplinary meetings were held, including meetings on the spot with residents of the different districts of the city, and close to 20 surveys were conducted on different issues to address information gaps. Dialogues for Sofia were also conducted. These are participatory, future-oriented events, bringing together diverse stakeholders, policy makers, activists and citizens, to discuss on challenges facing the city, and to co-create possible solutions providing benefit to all parties involved.

Another good practice is the integration of young people in the process of decision-making and institutional practices in one of the NGOs. Inclusiveness is also perceived as team building, forming groups of interest, managing different types of collaborations.



Sofia Municipality is believed to be quite responsive to changes in the external environment. Upon the outbreak of the COVID-19 crisis, the Sofia Municipality has introduced several new instruments and measures for informing citizens, for supporting businesses, as well as measures to support the urban transport.

The interviewees from the group of policy making and civils society identified some key factors of change: more channels for information are necessary, funding should be linked to some extent to RRI principles within the national operational programmes, innovative solutions addressing challenges of Sofia should receive stronger support by the Municipality, and programmes to encourage entrepreneurship among young people must be set in place.

Businesses

Eight interviews were conducted with representatives of companies and business clusters based in Sofia. In general, the business community has very little, if any, knowledge about the RRI framework. That being said, some of the RRI keys and AIRR dimensions are very relevant and often applied in their practice.

Most interviewees from business sector named stakeholder engagement as the most important RRI key. Many companies constantly communicate with different stakeholders, seeking feedback from partners in the industry sector and from policy and decision makers at the national and municipal level, but also from academia and the general public. The companies, which most often seek the opinion and involvement of the citizens are those involved in the shared use of light electric vehicles and in software development.

Business interviewees regard open access as crucial for economic development and experimentation. This is especially valid for business associations and clusters, as sharing information internally and externally with other interested parties is often among the main tasks. Clusters also encourage sharing of information among their members. Some companies require open source software and open data to be able to operate. Open access to data is a precondition for innovations. However, the EU regulations on data collection, use and sharing are very stringent and businesses need to be more actively involved in making decisions regarding data access and use.

All interviewees agree that there are no problems regarding gender equality in Bulgaria. In their opinion, gender-based discrimination is not possible, and in terms of employment and career, gender plays no role whatsoever. Whether a project is managed by a woman or a man is not important. All interviewed companies firmly support the principles of equality and non-discrimination on all levels. The only gender and diversity related problems were mentioned in the ICT sector. Due to a small number of women and representatives of minority groups among technical experts and IT developers, many algorithms and computer programmes might have an unconscious bias towards the male customers.

Science education is important for overall business progress across all sectors in the long-term. Several companies or clusters are involved in the educational work, often in partnership with different schools, universities or the Bulgarian Academy of Sciences.

Finally, business representatives acknowledge the importance of rigorous application of ethical standards. Some even have their own ethics codes. The most important criterion for accepting new members into clusters and associations is the ethical behaviour and responsibility of the company. The organisations, which provide funding and support to start-ups or projects, do so only on condition that the supported initiative has no detrimental effects on society, environment and people. Some companies have a strategy for corporate social responsibility, which includes objectives like becoming a carbon-free company, responsible use of resources



and sustainable development measures.

Anticipation, inclusiveness, reflection and responsiveness (AIRR dimensions)

Interviewees from the business sector easily recognised and identified with the AIRR dimensions. In their opinion, all four dimensions contribute to raising the awareness about existing problems and issues, help companies in long-term strategic planning, and are important for attracting investments and finding markets. Companies use different instruments to implement the AIRR dimensions.

Anticipation is important, as it helps the companies to develop new products, which are in line with future trends and developments. Anticipation also keeps the companies ahead of potential competition in their market niches. No research and innovation activity can be successful without being able to look forward and anticipate what will happen tomorrow. Anticipation should not be confined to the national context – it is essential to compare yourself with the global situation and thus to understand the global development tendencies.

Inclusiveness was often explained as an internal affair – engaging employees in developing innovation and research strategies and products, internal testing and evaluation, discussing business goals and sharing responsibility among all team members. Nevertheless, some companies develop their corporate business strategies with the involvement of external stakeholders as well, or have regular presentations and trainings in different cities across Bulgaria, meeting the local eco-system and establishing contacts.

Reflection involves using different KPIs – establishing why certain expectations have not been met, what went wrong, what could have been done better, and what could be done to prevent this in the future. It is closely related to principal managerial skills – the ability to predict and take corrective measures if predictions were not realised.

Responsiveness/adaptability is also important – each company should discuss and coordinate its activities with the beneficiaries it is targeting.

Some key factors that are suggested by the interviewees in order to make change possible are:

- Synergy of information systems.
- Collaboration and engagement with all stakeholders as well as productive engagement of experts from different fields.
- Utilisation of new technologies is needed in order to make possible the transition and development of new digital skills.
- Sofia Municipality should collaborate more with organisations from the business sector and engage them as experts as this will bring valuable external insight and can contribute to change internally.
- Projects like RRI-LEADERS should be communicated to a wider group of organisations and experts.
- Sofia municipality should consider introducing its own programme for research and innovation, funded by the municipality, so as to have the ownership of the results and reach long-term sustainability.

Sofia Municipality focus group discussion

The focus group took place on May 13, 2021, online via Zoom, with 12 participants, as follows: 4 from research and academia; 3 from policy making; 2 from NGOs; 3 from business. 4 participants were men and 8 were women. 8 of participants participated in the in-depth interviews, and 4 participants were new.



Summary of discussions

The focus group started with presenting the main findings of the interviews conducted prior to the focus group with representatives of the research and academia, business, policymakers, and NGOs. Differences and similarities per stakeholder group were outlined, including with regard to the four policy areas, namely support for innovation, digital transition and new skills, youth employment and entrepreneurship, and sustainable urban development.

Participants pointed out many important issues regarding the compatibility of the RRI framework and the AIRR dimensions with the objectives and actions envisaged in the strategies and actions plans for the selected policy areas in Sofia Municipality. To start with, there is an expressed need to base the development of municipal strategies on in-depth study of needs of local economy and society so as to avoid the mere repetition of priorities stated in EU-level documents. On the other hand, while there is sound expertise to conduct analyses as part of the policy making process, there is lack of sufficient capacity in defining strategic goals and creating long-term visions. Stakeholder engagement remains mainly at the level of evidence-gathering, but not for creating inspiring visions. Mechanisms for monitoring and evaluation of the impact of specific strategies are considered crucial for the attainment of the established strategic objectives. One good example in this respect is the recently adopted (2020) Strategy for Digital Transformation of Sofia.

Another important issue raised by the participants is the inclusion of different groups (civil society, business) in the process of strategies development based on their merit. Municipalities should aim at broader engagement, but the level of engagement of civil society, for example, largely depends on funding (which is absent, in most cases) and the proactive approach of the municipality of reaching out to citizens and civil society organisations. Thus, the role of Sofia Municipality is seen as supporting the process (either financially or through other means) and integrating the efforts of those involved.

Questions of ethics and responsible behaviour need to be more strongly reflected in strategic documents. While strategic documents are largely aligned with EU-level priorities, the missing link is the inclusion and collaboration with the stakeholders in their implementation. Ethical approach also necessitates a decentralised problem-solving and management of different issues. Few good examples exist (SofiaLab being one of them), and living labs need to be supported as important nodes in the innovation eco-system.

Regarding the two policy areas of the Municipality, *Youth employment and entrepreneurship*, and *Sustainable urban development*, participants referred to other stakeholders who could participate in the process of policy making: schools, teachers and teachers' organisations. Schools are the institutions responsible for the education of the future generations, which will be the leaders of change in the future. Skills and knowledge for innovation are nurtured and developed from an early age, starting in elementary school. Institutions for informal education also need to be involved in the process as well as NGOs, and various associations that promote and provide education. Their relevance is also in providing opportunities for entrepreneurship, as well as testing in practice what is learned. Having in mind the critical changes in many professions (due to digital transition and transformative technologies), the overall attitude and understanding of the role of education and learning needs to change. Other stakeholders that need to be included are representatives of science and research community, municipality, businesses, professional organisations engaged with urban development (architects, developers, urban planners, service providers and organisations/companies which can provide expertise linked to smart city development and digital public services).



Regarding collaboration/networking/interdependencies with the stakeholders in the policy area *Youth employment and entrepreneurship*, participants agreed that in the first place, the cooperation between schools, universities and business needs to be strengthened. In the fields of technical sciences and information technologies, the academia and the business cooperate very well, whereas this cooperation is very difficult in the fields of economy, finance, and management. Business representatives need to be more active and to serve as mentors for university students; a better dialogue is needed for the universities to know what skills and knowledge they have to teach their students in order to meet the demand of the labour market. There is a lack of interest in internship programmes (e.g., actions funded by the Erasmus+ programme); students are not actively pursuing them, which breaks the link between academia and employment. A better public awareness and communication to the public is needed in terms of funding programmes for digital transformation, innovation, etc. In the same perspective, science and the results of scientific research and innovation need to be adequately communicated to the public, and to young people in particular.

The current regulations on public procurement are considered a significant hurdle to innovation; Sofia Municipality should develop expertise and participate in innovation tenders and pre-commercial procurement, as well as to take a leading role in facilitating access to venture capital which is important for innovation. Finally, the municipality should be more active in providing support (through letters of commitment, for example) to large-scale projects, which can impact positively the processes of innovation.

With regards to the processes/structures that need to change, the starting point must be an accurate identification and assessment of needs. When it comes to future skills, for example, all stakeholders – schools, business, universities, organisations, need to be involved and agree on the framework of skills needed. In this process, the leading role lies within the public bodies; according to DESI (Digital economy and society index (<https://ec.europa.eu/digital-single-market/en/digital-economy-and-society-index-desi>)) Bulgaria has very low indicators for basic digital competencies and skills. In this respect (obtaining data, evidence-based policymaking, etc.), Sofia Municipality, as well as other municipalities in the country, should cooperate more closely with universities to access/adopt the results of scientific research. Another important issue is considered the development of tailored funding programmes of the municipality to address existing challenges and priorities in the policy fields. In terms of strategic policy development (sustainable urban development, innovation, and digital transition), the sustainable use of resources has to be made a horizontal priority in each area (following the Kyoto agreement).

Participants had different perspectives regarding the leaders of change. For some, it is business that sets the vision as business is result-oriented and has the motivation to support knowledge production and innovation. Therefore, what is needed is a good coordination with the business sector. In this respect, when it comes to the collaboration between academia and business, academia should be the active party – in “selling” to the business the knowledge and skills produced by science. According to other participants, the business sector (in Bulgaria) is not proactive and has so far failed to collaborate with universities to articulate its needs and contribute to the development of adequate curricula and programmes, responding also to the needs of society. At the same time, it is also important to follow global and EU standards in defining the parameters of collaboration (between business and academia); the policy making process is misguided if it only draws upon local standards to set priorities for research, innovation, and sustainable development. An important issue here is that while alignment of local policies with EU and global standards is important, these should not be simply copied and transposed into national/municipal documents, but have to consider national/local context.



Diverse opinions were expressed about who should be the main agent of change in different areas. With regard to innovation, Sofia Municipality needs to be the initiator of change. Participants were of the opinion that long-term visioning is needed so as to establish the kind of support needed to foster innovation in Sofia, for which the leading role of the Municipality is compulsory. In the policy area digital transition and transformation, however, the business should take the leading role, rather than the municipality.

Profiles of stakeholder organisations from the Sofia Municipality ^{The}

profiles of the following stakeholder organisations are presented in Annex A to the current report.

Policy-makers:

- Programme Europe
- Sofioplan
- Sofia Investment Agency (SIA)
- Sport and youth activities directorate of Sofia Municipality
- Innovative Sofia - Digitalisation, Innovation and Economic Development department of Sofia Municipality
- State Institute for Culture at the Minister of Foreign Affairs

Research and academia:

- Technology Transfer Office (TTO) at the Institute of Information and Communication Technologies (IICT), Bulgarian Academy of Sciences
- International Business School (IBS)
- Sofia University St. Kliment Ohridski
- University of National and World Economy (UNWE)
- State University of Library and Information Technologies (SULSIT)

NGOs:

- NGO Links
- Rinker Center
- Bulgarian School of Politics (BSoP)
- Foundation “The Duke of Edinburgh's International Award – Bulgaria”
- Maria's World Foundation
- Reach for Change Bulgaria
- Sofia Green project

Businesses:

- Health & Life Science Cluster Bulgaria (HLSCB)
- Electric Vehicles Industrial Cluster (EVIC)
- Innovation capital
- Virtech Ltd.
- Microsoft
- Bulgarian Start-up Association (BESCO)
- Lime
- Obecto Digital Cooperative



Annex Mapped RRI stakeholders

Mapped RRI stakeholders in the Sofia Municipality

■ Policy-makers

Name of stakeholder organisation: Programme Europe of Sofia Municipality	
Profile of the organisation	<p>Programme Europe is a small grants programme of Sofia Municipality, supporting NGOs and civil society organisations, registered on the territory of the city. It has been in operation since 2009. The Programme's priorities focus on the transfer of good EU practices to Sofia.</p> <p>Programme Europe was designed to encourage civic participation in the territorial development. It has developed into an innovation for the Sofia Municipality programme for public participation in local policies, as well as into a tool for transferring best practices from across Europe into local government/public sector. The Programme was the first one in Sofia to provide funds for the implementation of civic ideas and initiatives, thus encouraging citizen participation of in the activities and projects for the city.</p> <p>The Programme is managed by a Programme Council, comprised of municipal councillors and chaired by the Deputy Mayor for culture. The Programme priorities are defined by the Sofia Municipal Council, while the Programme Council is responsible for the strategic management and reports to the Municipality on the implementation of the Programme.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>The successful implementation of the Programme is an example of the good collaboration between local authorities and the civil society sector, academia, business, creative entrepreneurs, representatives of the European institutions in Sofia and the cultural centres of the European Union member countries. The involvement of all these actors is a guarantee for the formation of a stable civil society, able to contribute to the development of Sofia in line with the latest European trends.</p>
Relevance of RRI keys to the stakeholder	<p>The RRI principles are relevant for the Programme, because it uses public money and works with civil society. The two most relevant keys are public engagement as the Programme supports civil society projects, and open access since grant recipients are required to make their deliverables and outputs public and accessible to all.</p> <p>The application guidelines have provisions regarding ethics. Each beneficiary is responsible for copyrights; guidelines also state that no hate speech and no discriminative actions are tolerated. There are no requirements regarding gender equality, and gender is not an evaluation criterion for Programme applicants.</p>



Relevance of AIRR dimensions to the stakeholder	<p>Self-assessment is performed on operational level, although no official procedures exist. However, there is an annual Programme audit, which provides recommendations for improvement.</p> <p>Regarding the responsiveness, due to the coronavirus lockdowns in 2020, the Programme let beneficiaries adjust their project activities so that they could be implemented during the lockdown. Experts at the Programme worked individually with each beneficiary to help them adapt their project to the new realities. The application process was simplified as well by reducing the number of documents to be submitted.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>Programme Europe supports through grants the implementation of all 4 policy priorities, chosen by Sofia Municipality for the RRI-LEADERS project: innovation, digital transition and digital skills, youth employment and entrepreneurship, and sustainable urban development. In 2021, Programme Europe provides grants for the implementation of projects in all four areas.</p> <p>A call for proposals is published each year and the specific thematic priorities and the project budget are voted by Sofia Municipal Council. The Programme supports digitalisation and the application process is online. Most of the meetings and paperwork are done digitally. In 2020, administrative reporting was done electronically, but financial reporting required some paper documents.</p> <p>Young people need to be engaged in public activities and be more entrepreneurial. To support this, kindergartens are also eligible to apply for funding from the Programme in order to develop early-age intervention models.</p> <p>Sustainable urban development is a top priority of the Programme (e.g. reconstruction of public spaces, infrastructure, residential areas, etc). Here, partnership between civil society and local governments is key.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of influence on RRI in practice ■ Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>The benefits of the Programme for the Sofia Municipality are huge. This Programme was designed with the aim to become a platform for collaboration between civil society and local authorities, thus incorporating the public engagement principle of RRI as well as some AIRR dimensions, particularly anticipation, inclusiveness and responsiveness, within territorial governance.</p>
Website of the organisation	http://www.evropa-so.bg/bg/



Name of stakeholder organisation: Sofiaplan	
Profile of the organisation	<p>Sofiaplan is a municipal enterprise responsible for the spatial and strategic planning of Sofia Municipality in the area of sustainable development. Some initiatives in this field include: Green Sofia initiative, development of green areas registry, map of nurseries and kindergartens, map of schools, monitoring of immovable cultural heritage, mapping and evaluation of eco-system services, urban agriculture development and many others.</p> <p>Sofiaplan has a multidisciplinary team of about 30 experts, working in active dialogue with different stakeholders. Experts collect and analyse data on numerous aspects of the urban environment and municipal development and are responsible for making policy proposals to Sofia's Municipal Council, the Mayor, district mayors and the deputy mayors.</p> <p>The major projects of Sofiaplan are: Vision for Sofia (Strategy for the development of Sofia Municipality until 2050), Plan of Sofia (the current General Urban Plan and its upcoming renewal) and Programme for Sofia (Integrated Municipal Development Plan 2021-2027).</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>The RRI framework is relevant to Sofiaplan, because its key principles include transparency in strategic and spatial planning as well as opportunities for citizens' and experts' participation in the dialogue about the city's future. Furthermore, Sofiaplan cooperates with other municipal bodies, researchers and universities, NGOs, industry and business organisations, thus adhering to the RRI principles.</p>
Relevance of RRI keys to the stakeholder	<p>The modus operandi of Sofiaplan adheres to the RRI principles. The application of the RRI keys at Sofiaplan is mainly related to the sustainable urban development topic, which is the focus of its activities.</p> <p>Public engagement is very important for sustainable urban development. Sofiaplan actively cooperates with organisations that are interested to participate in the policy design in a certain topic/field. Sofiaplan also strives to raise the sensitivity of citizens towards urban planning policies in Sofia, as policymakers tend to support such policies only when they are driven by the public interest.</p> <p>Open access has a key role because it gives legitimacy to policies – it confirms that they were developed on the basis of scientific facts and research. Sofiaplan is currently working on a technological solution that will provide access to all raw data, gathered during the development of Vision for Sofia.</p>
Relevance of AIRR dimensions to the stakeholder	<p>All AIRR aspects are important for Sofiaplan.</p>

	<p>Anticipation is practiced to a certain extent. The assessments and scenarios are key elements of Sofiaplan's work used to inform policymakers about prospective developments and outcomes in the city.</p> <p>Reflection is performed through regular meetings to discuss problems, plan activities and to brainstorm about ways to improve the work process.</p> <p>Regarding responsiveness/adaptability, Sofiaplan regularly observes relevant processes in the city, including their development over time, because this is an essential part of the work of the organisation. The team is very adaptive and flexible in adding and applying new working methods and instruments as all employees always look for the most efficient way to perform their work.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>All four policy areas are relevant and connected to the work of Sofiaplan, but sustainable urban development is the most important topic as it is the focus of their activities.</p> <p>Since Sofiaplan is a municipal enterprise, responsible for all aspects of spatial and strategic planning in Sofia, it is one of the major stakeholders to contribute to the development of the RRI-LEADERS transformative outlook. On the one hand, the company has the necessary expertise in sustainable urban development, and on the other hand, it could make proposals for policy developments to Sofia's Municipal Council, the Mayor, District Mayors and the Deputy Mayors.</p> <p>Sofiaplan is also a pioneer in the Sofia Municipality regarding digitalisation. Sofiaplan has made a proposal to transfer the model of its digital database to Sofia Municipality and has promoted other digital work methods as well.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of experience in RRI ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>As Sofiaplan is a municipal enterprise, its involvement in adopting the RRI principles and the AIRR dimensions will have direct positive impact on policy development and implementation in the area of strategic and spatial planning at municipal level. As spatial planning concerns all citizens, living in the city, their participation in the process will lead to higher public satisfaction and acceptance of the end result.</p>
Website of the organisation	<p>https://sofiaplan.bg/en/index-en/</p>



Name of stakeholder organisation (and abbreviation): Sofia Investment Agency (SIA)	
Profile of the organisation	<p>Sofia Investment Agency (SIA) is part of the administration of Sofia Municipality. It offers a one-stop service for foreign companies, entrepreneurs and start-ups, looking to set up business in Sofia. The Agency supports companies to launch operations as fast and effortless as possible. This is done by connecting businesses with relevant local actors (other businesses as potential partners, universities/research, public bodies, etc.), explaining local legislation, delivering benchmarking services within the respective industry, providing analyses on business climate, investment incentives, strategic location factors, etc. The services of SIA cover all stages of setting up a business - from initial data collection and benchmark analysis to networking and the actual business launch.</p> <p>SIA facilitates Public Private Partnerships between Sofia Municipality and foreign/local businesses. The Agency is also responsible for privatisation and post-privatisation control on the territory of Sofia Municipality. Locally, SIA aims to connect businesses, academia and administration and to facilitate new entrepreneurship and business ventures.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>SIA serves as an intermediary between businesses and academia. This is a priority area in its work, because such collaborations are reflected in improved planning and availability of professional and highly skilled human capital.</p> <p>Due to this role of SIA, RRI is very relevant and applicable to the Agency. Even though RRI principles have a non-legal status, the Agency fully adheres to them. The RRI framework is perceived as an adequate and realistic framework, which allows for measurement and standardisation of results between EU countries.</p>
Relevance of RRI keys to the stakeholder	<p>The two most important RRI keys for SIA are public engagement and open access.</p> <p>In the context of public engagement citizen input is important in order to stay abreast of new developments and to be aware of public needs. Public engagement is also a form of monitoring and external evaluation, helping the agency to improve the way work is done.</p> <p>Open access is a key factor for innovation and development. Data sharing will accelerate progress and innovations. Moreover, by comparing the Agency's work to other initiatives, one can build upon what has already been done, rather than duplicating efforts.</p> <p>Gender equality is important, regardless of the field of work.</p>
Relevance of AIRR dimensions to the stakeholder	<p>At SIA, anticipation encompasses the following activities:</p> <ul style="list-style-type: none"> ■ Statistics/data analyses are required to be able to plan ahead and implement policies and projects. Data ensures the predictability

	<p>and reliability of foresight scenarios. Because of that, SIA offers data, prognostics and future scenarios to potential investors so they can plan their investment strategies.</p> <ul style="list-style-type: none"> ■ Communication with stakeholders as their input is needed in order to be aware of current realities and potential future trends. <p>Inclusiveness: Public engagement is needed as corrective and timely input of ideas and information coming from either citizens, clients or end users of services. Consultations with experts is of crucial importance as they provide the point of view of international actors, share good practices and are able to outline possible trends for development.</p> <p>Self-assessment is paramount for SIA's work, because without it, the Agency will not have a realistic picture about the current situation. In practice, this means setting up and following achievable KPIs, because measurable indicators are important for ongoing monitoring of the work progress, regardless of the specific area.</p> <p>Responsiveness/adaptability:</p> <ul style="list-style-type: none"> ■ All viewpoints need to be considered as they belong to citizens/members of the community. ■ Representatives of the administration, policymakers and businesses need to be involved in a dialogue and exchange ideas with one another as well as with stakeholders and citizens.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The Agency has a stake in all the following priority areas (Innovation support; Digital transition and new skills; Youth employment and entrepreneurship; Sustainable urban development):</p> <ul style="list-style-type: none"> ■ Support for innovations is key to build a smart city, as set in the Strategy for digital transition of Sofia. ■ Innovations mean value-added technological development in critical urban-development areas such as clean air, infrastructure, built environment. The same advantage can also be gained through digital transition. ■ Regarding youth employment and entrepreneurship, SIA participates in initiatives for entrepreneurship, offering mentorship and trainings for team building and enhancing management capacity. Entrepreneurial thinking from an early age and subsequent tailored programmes are critical for building the workforce of tomorrow. ■ SIA also organises lectures at universities, aiming to introduce students to investment opportunities, internships, employment and funding opportunities in Sofia and abroad. ■ Urban development naturally features in all of these sectoral policies, as improving the city environment is key for building resilient and competitive cities.

Relevance of the organisation to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>SIA is part of Sofia Municipality and its objective is to attract and retain talented entrepreneurs and researchers, who will help the city become a centre of innovation, SIA's involvement in adopting the RRI principles and AIRR dimensions will contribute to the work of territorial governance so that is in line with the latest governance trends of co-design and co-creation of policies. As a result, involved stakeholders will develop a sense of ownership over these policies, thus making them applicable and sustainable.</p>
Website of the organisation	https://investsofia.com/

Name of stakeholder organisation: Sport and Youth Activities Directorate of Sofia Municipality	
Profile of the organisation	<p>The Sports and Youth Activities Directorate designs and implements the municipal policies in the field of physical education, sports and youth activities. The Directorate includes two departments, namely the sports department and the youth activities department.</p> <p>The sports department has several functions:</p> <ul style="list-style-type: none"> Organisation, control and coordination of extracurricular activities of educational institutions in Sofia in the field of physical education, sports and tourism. Coordination and control of Sofia Municipality programmes in the field of physical education, support and development of children and youth sports. Assistance in the implementation of regulations of Sofia Municipality for the management of municipal sports facilities. Maintenance of an information database for municipal sports infrastructure and implemented sports projects. Support of the activities of civil society structures, sports clubs and educational institutions related to sports and healthy lifestyle. <p>The youth activities department has the following functions:</p> <ul style="list-style-type: none"> Organises activities supporting the implementation of the Municipal Strategy for Young People. Coordinates and controls project funding of youth activities under Municipal programmes. Participates in consultative and public councils on youth activities and policies. Maintains an information database for the activities of educational institutions, universities and NGOs applicable to civic

	<p>and health education as well as initiatives for the prevention of social exclusion of disadvantaged young people.</p> <ul style="list-style-type: none"> ■ Supports youth volunteering, civic activity, personal and career development of young people, prevention of risky behaviour, health and civic education. ■ Assists in the administrative services and organisational activities of the Advisory Council for Youth Policies. <p>The Directorate also coordinates the activities of the Council for Child Traffic Safety at Sofia Municipality and supports the implementation of the municipal Programme for the protection of the life and health of children as participants in road traffic.</p>
Relevance of Responsible Research and Innovation to the stakeholder	All aspects of RRI have a high relevance to the work process of the Directorate, considering that it is the part of the municipal administration responsible for developing and implementing policies, related to children and young people.
Relevance of RRI keys to the stakeholder	<p>The most important RRI key for the Directorate is public engagement. The inclusion of various actors (schools, businesses, parents, students) implies a sort of a ‘public contract’ between them in terms of shared responsibility, transparency, and accountability. Moreover, public engagement is important for getting valuable feedback from the citizens, which is necessary to correct and improve the administration’s work.</p> <p>Open access is also considered important.</p> <p>Research ethics and science education are moderately important for the Directorate. Regarding science education, experiential learning needs to be encouraged among children and teenagers as learning by doing is more important than the traditional delivery of knowledge and information by the teachers.</p> <p>An interesting fact regarding gender equality is that women entrepreneurs are more active than men. Out of 58 participants in the Academy of Visionaries (a new programme led by the Directorate since 2020, which supports young people in the age group 15-29 years to develop their individual projects), 40 are women. Statistics also reveal that youth unemployment affects young men disproportionately.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is considered crucial for the policy development and implementation of the Directorate.</p> <p>Inclusiveness is regularly applied at the Directorate. Public consultations, focus groups and open days are widely used. However, experience shows that citizens seem to be more active in filing complaints, rather than in actively cooperating with the municipality on addressing concrete issues.</p>

	<p>Regarding self-assessment, the Directorate has a risk assessment strategy, which is updated annually. In addition, external audits are conducted every four years. Programme beneficiaries also provide feedback on project implementation, which is used for ongoing assessment about the level of interest in the grants, their impact, the type and number of applicants, etc.</p> <p>In terms of responsiveness/adaptability, 10 years ago, there was only one funding programme for sport activities at kindergartens and schools. Since then, there was a strong interest in other topics and areas of funding, but based on input and proposals from potential beneficiaries, the programme's scope was revised and expanded to new areas as well.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>From a policy perspective, especially in the field of youth employment and entrepreneurship, the Sports and Youth Activities Directorate at Sofia Municipality is a stakeholder with primary importance. It is the actor that creates suitable conditions for the implementation of the municipal policy for youth employment and entrepreneurship – an area directly linked to access to education and assurance of its quality. There are programmes for prevention of school drop-outs as this is one of the biggest problems in the educational system on the territory of the city.</p> <p>Furthermore, the Directorate is responsible for organising school and career fairs, school/municipal festivals and information fairs on the territory of Sofia.</p> <p>The latest initiative is the Academy for Visionaries that focuses on youth employment and entrepreneurship. Its goal is to support young people in the 15-29 age bracket to develop their individual projects, related to different social causes and/or entrepreneurship activities.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of interest in relation to RRI in practice ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>As the Sports and Youth Activities Directorate develops and coordinates a wide array of policies and initiatives for children and teenagers, the adoption of the RRI keys and the AIRR dimensions is of critical importance. RRI keys and AIRR dimensions will contribute directly to a transparent co-design policy process, involving all relevant stakeholders who will collaboratively develop policies and initiatives, targeted at one of the most important and at the same time vulnerable societal group, namely children and youth.</p>
Website of the organisation	<p>https://www.sofia.bg/en/web/mayor-of-sofia/structure-of-administration</p>



Name of stakeholder organisation: Innovative Sofia - Digitalisation, Innovation and Economic Development department of Sofia Municipality	
Profile of the organisation	<p>The Digitalisation, Innovation and Economic Development department of Sofia Municipality was established in 2020 to support Sofia's development as a smart, digital, innovative and tech city. It works in close collaboration with the Deputy Mayor for Digitalisation, Innovation and Economic Development. The department will consolidate and guide all of the city's digital and smart city projects and will support high-tech and R&D investors in Sofia. It will focus on increasing the number and quality of municipal e-services, open data and smart city projects implementation.</p> <p>Innovative Sofia's objectives include:</p> <ul style="list-style-type: none"> ■ Reducing the administrative burden and providing more and better e-services to citizens and businesses. ■ Supporting the development of the business climate in Sofia, the ability and the capacity of the city to attract investments, human capital, and innovation. ■ Turning the city into a market for the ICT sector and a platform for innovation. ■ Facilitating the innovation potential of the technology companies in Sofia.
Relevance of Responsible Research and Innovation to the stakeholder	<p>Responsibility in research and innovation is perceived as enabling and encouraging an effective dialogue among all relevant stakeholders, including public institutions, research and academia, Sofia Tech Park, CSOs, businesses, foundations, clusters, associations. It is important to engage all these actors because sustainable urban development does not depend only on the municipality, its departments and various municipal enterprises. The active involvement of all relevant actors in the eco-system as well as strong cooperation among them is absolutely necessary. Most of the activities undertaken by Innovative Sofia are in line with RRI principles.</p>
Relevance of RRI keys to the stakeholder	<p>Several strategic documents have direct relation to RRI – the Innovation Strategy for Smart Specialisation of Sofia, the Digital Transformation Strategy, the Strategy for Smart Specialisation of Bulgaria, the National Scientific Research Strategy of Bulgaria, the work of the National Science Fund and the Ministry of Education and Science.</p> <p>All five RRI keys are represented in the activities of Sofia Municipality, however, gender equality is not a problematic issue in Sofia.</p> <p>Public engagement: It is very important to include citizens in the design of policies and long-term visions, so that a social consensus can be achieved through discussion and exchange of different views and</p>

	<p>ideas. The municipality already has many online mechanisms for consultations with citizens, and the focus is on optimising the process and expanding the scope. A good example is the Digital Transformation Strategy for the City of Sofia, which was developed through consultations with over 100 stakeholders (from universities, research organisations, businesses, associations and clusters) and was then validated by citizens. Another good practice was the process for creating the Vision for Sofia until 2050, where numerous citizen surveys and inquiries, made over a four-year period, were used as input for its development.</p> <p>In 2020, Sofia Municipality launched an official Viber community for COVID-19, where important information about the situation in the city and current measures affecting the citizens of Sofia are published on a daily basis.</p> <p>Science education is the most important element, if considered more broadly than STEM, including life-long learning entrepreneurial, leadership and other soft skills. At the moment, Innovative Sofia is involved in the development of a digital education platform.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is a very important aspect allowing short and long-term planning as well as quicker response to unexpected situations. For example, the Digital Transformation Strategy of Sofia includes many aspects of anticipation. Anticipation was also applied when elaborating the Vision for Sofia that looks at the development of Sofia in seven policy areas, with a time horizon to 2050.</p> <p>Inclusiveness: The processes of engaging and consulting citizens, experts and stakeholders during the elaboration of Vision for Sofia 2050 is an excellent example of inclusiveness. More than 400 multidisciplinary meetings were held as well, meetings on the spot with residents of the different districts of the city, and close to 20 surveys were conducted on different issues to address information gaps. Dialogues for Sofia were also conducted. These are participatory, future-oriented events, bringing together diverse stakeholders, policy makers, activists and citizens, to discuss on challenges facing the city, and to co-create possible solutions providing benefit to all parties involved.</p> <p>There are internal procedures for self-assessment at Sofia municipality, but they vary across departments and municipal units. These procedures are often updated to include new indicators for quality control and effectiveness as well as for process monitoring. One of the main goals of Innovative Sofia is the digitalisation of these processes, which will undoubtedly improve the process of self-assessment and reflexivity.</p>

	<p>Responsiveness: The municipality is quite responsive. A good example of this is the COVID-19 crisis, during which several new tools and measures have been introduced such as information for citizens, support to businesses, measures for support of city transport, quality of air.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The policy areas, most important to the work of Innovative Sofia, are support for innovation and digital transition. The main goals of Innovative Sofia are to facilitate digital transformation across all urban governance processes in the municipality and to achieve administrative reform. The aim is also to transform Sofia into an engine of digitisation and smart-city activities into a city that stimulates innovation.</p> <p>An important programme of Innovative Sofia is the ‘Sandbox for Innovative Solutions’. It supports pilot projects for testing innovative tech solutions on urban challenges, such as environment, utilities, education, transport, e-government, entrepreneurship, innovation, etc., as defined by the city administration. The importance of Innovative Sofia within the territory is huge as it is part of the municipal administration.</p>
Relevance of the stakeholder to objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of influence on RRI in practice ■ Stakeholders with high levels of power
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>Innovative Sofia is a department within the municipal administration, and therefore an official representative of territorial governance and as such it could promote the adoption of the RRI and AIRR principles to relevant actors in the eco-system of the city and to other public bodies on municipal and national level, research and academia, CSOs, businesses, foundations, clusters. RRI and AIRR principles could also be adopted by associations, such as BESCO (Bulgarian Start-up Association), BASSCOM (Bulgarian Association of Software Companies) and BRIGHT (IT management consultancy) in IT sector, Artificial Intelligence Cluster Bulgaria, Bulgarian Fintech Association, as well as Sofia Tech Park, etc.</p>
Website of the organisation	www.innovativesofia.bg

Name of stakeholder organisation: State Institute for Culture at the Ministry of Foreign Affairs	
Profile of the organisation	<p>The State Institute for Culture at the Ministry of Foreign Affairs plays an important role in international cultural relations of Bulgaria. It supports the successful implementation of Bulgaria's foreign policy priorities through cultural diplomacy.</p> <p>In order to achieve its aims, the Institute:</p>



	<ul style="list-style-type: none"> ■ Supports programmes and projects, focusing on cultural diversity and intercultural dialogue. ■ Promotes the establishment of direct relations between Bulgarian cultural operators and their counterparts abroad to create opportunities for the presentation of Bulgarian culture both on the European and the global cultural scene. ■ Supports and implements cultural projects and programmes that contribute to the transformation of cultural cooperation into integrated intercultural dialogue according to the European Union's cultural agenda. ■ Supports the coordination of activities, dedicated to international cultural policy, of both governmental and non-governmental organisations. ■ Encourages cultural organisations to broaden their geographic scope in promoting Bulgarian history and culture. ■ Offers professional assistance in the implementation of bilateral and multilateral cultural projects and events to Bulgarian diplomatic missions.
Relevance of Responsible Research and Innovation to the stakeholder	<p>The Institute collaborates with other cultural and historical institutions on the implementation of various cultural projects, therefore most of RRI principles are relevant to it in this regard.</p> <p>Some of the Institute's projects, such as exhibitions focusing on historical figures important for gender equality, the role of women, women's rights, highlight the gender equality.</p> <p>At the Institute, responsibility is associated with a strict application of one's legal duties, a sound financial management, carrying out work within the set deadlines.</p>
Relevance of RRI keys to the stakeholder	<p>Ethics is very important, because trust in the science can be built only by ensuring ethical standards and procedures in the public research sector.</p> <p>Open access is mandatory for the work of public institutions. Sharing information/data and cultural artefacts with other cultural/historical institutions is a necessity when implementing different projects. The Institute works with researchers and scientists and this is an opportunity to validate and make their research visible. Cultural diplomacy has the potential to help researchers gain international recognition and publicity for their accomplishments.</p> <p>Gender equality is reflected differently in the Institute's work, depending on the respective project/theme.</p> <p>Science education is also considered important.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is obligatory for good governance and two essential elements in this respect are risk analysis and cost-benefit analysis.</p>



	<p>Regarding youth employment, it is important to have careful planning of resources, internships and assignments for young people. Well-planned youth programmes are also a good instrument for assessing the skills that young people need to possess.</p> <p>At the Institute, inclusiveness is related to integrating young people in the process of decision-making and institutional practices. This is done by gradually building up the level of responsibilities, assigned to young people and new employees. Based on their level of involvement, one can also assess the interest and potential of young people for the specific job. More generally, inclusiveness also relates to team building, forming groups of interest, managing different types of collaborations, etc.</p> <p>Reflexivity (self-assessment) is related to evaluating the sustainability of an employee's work and also to measuring the effects of investing in young people. At the Institute, self-assessment is conducted through team meetings at which the performance of employees or of student interns is evaluated.</p> <p>Regarding the aspect of responsiveness/adaptability, the Institute is flexible and feedback from young people is sought in order to ameliorate the Institute's operations and methods of work.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The activities of the Institute are related to two of the selected policy areas, namely support for innovations and youth employment and entrepreneurship. The Institute supports young people by offering internships to help them acquire skills needed for employment. It also provides funds for innovative youth-initiated projects related to history and culture. One of the Institute's objectives is to support young people both in developing innovative cultural projects and in providing them with skills for employment. Therefore, the Institute's role within the territory is closely related to supporting youth in the context of the two policy areas mentioned above.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<p>■ Stakeholders with high levels of interest in relation to RRI in practice</p>
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>As a state body, supporting innovations and youth employment, the Institute can promote the RRI and AIRR principles among the young people, who participate in the Institute's national programmes and/or internships as well as among the young artists it supports. Also, it can promote these principles during the implementation of the cultural projects it either participates in or supports. Furthermore, it can promote the RRI/AIRR principles among the other state bodies/institutions it collaborates with.</p>
Website of the organisation	<p>https://www.culture-mfa.bg/</p>

■ Academia and research

Name of stakeholder organisation (and abbreviation): Technology Transfer Office (TTO) at the Institute of Information and Communication Technologies (IICT), Bulgarian Academy of Sciences (BAS)	
Profile of the organisation	The Technology Transfer Office (TTO) at the Institute of Information and Communication Technologies within the Bulgarian Academy of Sciences (IICT-BAS) was founded to conduct fundamental and applied research in computer sciences as well as information and communication technologies (ICT). TTO supports the establishment of a national innovation infrastructure in the sectors of Energy Efficiency and Information and Communication Technologies. This infrastructure will potentially be a key factor for the development and enhancement of the 'science-to-business' perspective, for the promotion of new knowledge, and technology transfer towards Bulgarian enterprises in support of their competitiveness and sustainable development.
Relevance of Responsible Research and Innovation to the stakeholder	The guiding principles of TTO are inclusion of a wide spectrum of experts in the processes of innovation; support to the cooperation between various parties; effective investigation of ideas, selection and identification of the good ones; encouraging experts to actively participate in the processes of innovation; and sharing ideas in the context of partnerships established by the TTO. These principles largely adhere to the RRI framework.
Relevance of RRI keys to the stakeholder	<p>Note: The information below is relevant to both TTO and BAS.</p> <p>Science needs to meet the needs of both society and industry and be able to address social and economic problems. It is essential to provide open access to scientific and research data and results as well as to produce knowledge that has positive social impact. Moreover, the Ministry of Education and Science has defined open access as one of the indicators for assessment and ranking of universities and research organisations in the country, and BAS abides by this requirement. All national programmes for science and research require open access to publications and research results.</p> <p>Regarding the ethics key, while it is not mandatory, BAS encourages researchers to adhere to the ethical standards documented in the European Charter for Researchers.</p> <p>Involvement of scientific organisations in territorial development has been in focus since 2012, when an Expert Council for Science, Technology and Innovations was established at Sofia Municipality. Its aim was to support the Mayor's office, which is considered a good practice in Bulgaria and is also recognised as such by the European Parliament.</p>



	<p>Another good practice is the establishment of the research and industry laboratory “Industry i2030” (RILab i2030) in May 2019 at the Bulgarian Academy of Sciences, and in partnership with Sofia Municipality, Sofia Development Association and Sofia Investment Agency. RILab i2030 aims to integrate science, business and education in the field of digital technologies. It also offers support for research, joint innovation and research projects to SMEs and high-tech industries. The Lab helps businesses to commercialise the results of research, supports technology transfer as well as helps companies to exploit innovative products. RILab i2030 will further provide trainings to PhD students, postgraduates, undergraduates and high school students through practical STE(A)M work and internships.</p> <p>Regarding science education, many BAS institutes cooperate with schools in various projects, thus actively including science and research units in STEM education in schools.</p> <p>A School Institute (https://uchiban.eu/uchi-ban/) was established at BAS in 2014 with the objective to provide an opportunity to high school students to engage in research in all scientific fields from natural, social and humanitarian science to art. Students create projects on topics of their choice that have specific objectives and a methodology to ensure successful project completion. The purpose of this action is to stimulate their creativity and entrepreneurship.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation, inclusiveness and responsiveness are important for the work of TTO. Regarding research objectives, the TTO strategy is both reactive and proactive. The Institute has executed a number of innovation projects as a response to the needs of the industry and in some cases, it develops innovations that are considered visionary by the TTO team. Also, TTO transfers technologies by offering research equipment to SMEs so that they can conduct research. The Institute supports people from the business sector in the process of their doctoral thesis development and/or research.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The policy field that is most relevant to TTO at IICT-BAS is digital transition and new skills. BAS is not only a major stakeholder within the Sofia municipality, but it also gathers some of the other main actors within the RILab i2030. TTO cooperates with all actors in the innovation eco-system. At national level, it cooperates with the Bulgarian Small and Medium Enterprises Promotion Agency (BSMEPA).</p> <p>TTO considers that new technologies are essential for both schools and higher education institutions. A good practice in this respect is the School Institute of Mathematics and Informatics at BAS, targeted at middle and high-school students. As it proved very successful, there are plans to establish similar institutes, dedicated to physics and</p>

	robotics so that both students and teachers get access to new knowledge and skills. In the long term, there is an objective to establish one such institute in every school in Bulgaria in order to encourage STEM education, resulting in a new generation of young scientists.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of experience in RRI ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	The Bulgarian Academy of Sciences is one of the major stakeholders in the research and innovation field in Bulgaria. As a consequence, the involvement of BAS in the formal adoption of the RRI principles and AIRR dimensions will bring a qualitative change in the overall operation of actors in the innovation eco-system. There will also be a positive impact on research organisations and academia, the private sector as well as public institutions and the way they design policies.
Website of the organisation	https://ott-iict.bas.bg/ENG/index_EN.php

Name of stakeholder organisation (and abbreviation): International Business School (IBS)	
Type of stakeholder: Academia and Research	
Profile of the organisation	<p>The International Business School (IBS) is an independent, private higher school, established in 1991 as the first private higher college in Bulgaria with international affiliation, the Bulgarian-Danish College of Business, Export and Marketing. In 2002, it was transformed into a specialised higher school, the International Business School and was accredited by the National Evaluation and Accreditation Agency for degree programmes at bachelor's, master's and doctoral levels.</p> <p>The mission of the IBS is to change life, economics and society by means of business education and scientific research. It pursues its mission by integrating several important components including education and teaching, research and engagement with stakeholders.</p> <p>Education and teaching aim to develop motivation for lifelong learning to all students and scholars, so that they can effectively and responsively reach their full potential for leadership in different business organisations and communities.</p> <p>Scientific research is designed to achieve substantial research and exploratory contribution in order to respond to major current issues in businesses and management practices at national and international level.</p> <p>Engagement with the community focuses on contributing to the successful economic development and the adequate integration of</p>



	Bulgaria in the global economy by means of transfer of knowledge, competencies, innovations and human potential.
Relevance of Responsible Research and Innovation to the stakeholder	Being a research-performing academic institution, the RRI framework is relevant to IBS activities. Research is conducted by different research teams and interaction and cooperation among them are important at all stages of the process. Open science means that no scientist can work individually. Responsibility is part of the cooperation of the R&I teams and is also linked to the social impact of science. In addition, it is important to recognise that the involvement of science, business and academia is necessary in R&I. In the context of open science, responsibility means the proper management of intellectual capital, fair use of scientific results and respect for intellectual property rights. In addition, the Ministry of Education and Science (MES) recently adopted a strategy for Open Science which is to be adopted by universities.
Relevance of RRI keys to the stakeholder	<p>In general, the RRI framework and its five principles are applicable to understanding responsibility in research at IBS. The five principles, in essence, are reflected in many IBS' documents. For example, the IBS Code of Ethics includes provisions on academic integrity and plagiarism. There are also regulations for doctoral students and academic tenure/promotion. The Code of Ethics is applicable to all IBS' staff members.</p> <p>Ethics addresses issues in the procedures for performance assessment of staff. IBS also uses software for detecting plagiarism.</p> <p>Open access is provided to all academic/research publications, because they are published in open-access repositories of scientific research.</p> <p>Science education is included in the curriculum of IBS, and students are involved in accreditation procedures, in projects, etc. Specific indicators in these areas are included in the national annual university ranking system.</p> <p>Public engagement is very important, because it encourages science cooperation, development of publications and support to young researchers. IBS complies with the Higher Education Act and the accreditation procedures by the National Accreditation Agency, which require cooperation with the business community, public institutions, students, etc. For example, IBS cooperates with Junior Achievement Bulgaria and with high schools in order to engage and attract young people in science projects. Teachers from the so-called Innovative Schools are trained at the International Business School, which also allows teachers to get involved in science and research projects.</p> <p>Gender equality is important, but not a problem for Bulgaria. In fact, at IBS women are better represented than men. However, when</p>

	evaluating gender equality, one needs to keep in mind that academic achievements matter most in terms of position distribution between men and women.
Relevance of AIRR dimensions to the stakeholder	IBS has a development strategy for higher education and research, which is in line with the National Research Strategy and the National Innovation Strategy of Bulgaria. Each year, IBS reports to the Ministry of Education and Science about achievements related to the priorities for smart specialisation. IBS also follows a quality assurance system, which includes annual risk assessment plans and SWOT analysis.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	IBS and its programmes contribute directly to the youth employment and entrepreneurship policy area. IBS offers a MA programme on entrepreneurship and management, in cooperation with ARC Fund. IBS is strong in collaborating with partners from various sectors such as business, tourism and security. For example, IBS has a programme council where business representatives participate and as well IBS students have direct access to the businesses. This is directly linked to support for innovations. IBS marketing programmes offer courses on digital content, digital marketing, etc.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of experience in RRI
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	IBS can include the RRI principles and AIRR dimensions in its Code of Ethics. IBS can also promote RRI/AIRR principles to stakeholders through the collaborations that it makes; it collaborates with other academic institutions in the country through joint projects, academic fora, joint publications; it also forms collaborations with businesses such as marketing companies, consulting companies in tourism, professional associations in marketing and tourism.
Website of the organisation	https://ibsedu.bg/en

Name of stakeholder organisation (and abbreviation): Sofia University 'St. Kliment Ohridski' (SU)	
Profile of the organisation	Sofia University 'St. Kliment Ohridski' is the first higher education institution in Bulgaria, established in 1880. Today, Sofia University (SU) is the biggest and most prestigious scientific hub in the country. It has 16 faculties with 119 special subjects being taught. Several independent units operate within the University: The University Library, the University Press with a printing house, a University Centre for Information and Communication Technologies, a Science Research Sector, and the University Botanic Gardens. There are also several museums: the Sofia University Museum; the Museum of



	<p>Palaeontology and Historical Geology; and the Museum of Mineralogy, Petrology, and Ores and Minerals.</p> <p>The scientific activities of each faculty at SU are an obligatory part and an integral part of the teaching process. They are conducted in compliance with the Strategy for the Development of Scientific Research, which defines the priority research domains and delineates the long-term plan for systematic science and research activities addressing social needs.</p> <p>The mission of SU is to develop the scientific, educational and cultural potential of Bulgaria, whereby the new emphasis is on creating models for social development both by revealing the intrinsic ability of institutional change and the social results of such a change.</p> <p>Sofia University is the leader in the country in terms of number of participants in the students' and lecturers' mobility and the creation of European space in the domain of university education.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>Broadly understood, science and research have responsibility to society. Scientists are expected to build schools of thought and research, to establish and support a culture of respect to science and this is more than relevant for a prestigious institution such as SU. Responsibility in research suggests motivated researchers, which in turn implies that a new value system shall be adopted.</p> <p>In 2019, SU received the "Human Resources Excellence in Research" award due to its HR strategy, which aligns the entire process from recruitment to career development of young researchers in line with the European Charter for Researchers. The university has carried out a gap analysis and has initiated university-wide discussions regarding the principles of academic promotion and faculty development.</p>
Relevance of RRI keys to the stakeholder	<p>In principle, the five RRI keys are useful and SU strives to integrate them in its research policies, but their implementation in practice is still difficult.</p> <p>Public engagement is very important for Sofia University – SU communicates and collaborates with many institutions in this respect organising career fairs, working with young researchers, or doctoral students.</p> <p>At SU, gender equality is not an issue, because women are more prominent in leadership positions than men.</p> <p>In terms of science education, there is a need for a stronger collaboration with teachers and educators.</p> <p>As regards open access, SU is a member of the European Open Science Cloud.</p> <p>SU has ethics codes and academic integrity codes, implemented according to the national legislation. Also, the HR award received by</p>

	SU led to the adoption of new internal regulations concerning tenure and academic promotion, the appointment of researchers and intellectual property rights.
Relevance of AIRR dimensions to the stakeholder	<p>Regarding anticipation foresight is used only rarely, and not by all University departments, aimed at updating or adapting the education programmes and curriculum.</p> <p>Inclusiveness is considered extremely important. SU strives to collaborate with public bodies and other stakeholders and it is worth noting that very good partnerships have been established in the field of ICT.</p> <p>Assessment/reflexivity takes place as periodic evaluations which are performed as per the requirement for the annual national university rating system. Also, the work executed for the HR award has improved the administrative procedures regarding researchers' development.</p> <p>In the matters of responsiveness, in principle, SU is adaptive and reacts to changes in the environment.</p>
Importance of the stakeholder within the territory in the context of the chosen policy focus	The policy areas that are of relevance to the University are digital transition, support for innovations, and youth entrepreneurship .
Relevance of the organisation to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	As the University is the largest and most prestigious educational institution in Bulgaria, it has the ability to be a trend-setter. As such, it could influence other academic institutions as well as other relevant main actors in Sofia, such as research institutes, industry, policy-makers, teacher's syndicate, schools, NGOs, active in STEM development, ICT cluster, Junior Achievement Bulgaria. Therefore, it is potentially contributing to the spread of the RRI/AIRR dimensions among all these actors.
Website of the organisation	https://www.uni-sofia.bg/



Name of stakeholder organisation (and abbreviation): University of National and World Economy (UNWE)	
Profile of the organisation	<p>The University of National and World Economy (UNWE) is the largest and the oldest higher school of economics in Bulgaria and in South-Eastern Europe, established in 1920.</p> <p>According to its vision, UNWE shall be the leader among higher-education schools in South-Eastern Europe, focusing on two major activities:</p> <ul style="list-style-type: none"> • educating students and • conducting research in the field of economics, management and administration.
Relevance of Responsible Research and Innovation to the stakeholder	<p>RRI is important to UNWE, because in addition to educating students, the other major activity at the university is conducting research.</p> <p>The R&D objectives of UNWE include:</p> <ul style="list-style-type: none"> ■ Developing scientific knowledge in the areas of economics, management, law and other scientific fields. ■ Ensuring scientific and methodical support to the educational process, organised by the university. ■ Enhancing the scientific qualification of university lecturers. ■ Stimulating creativity and ensuring conditions to develop the skills of undergraduate and PhD students. <p>At UNWE, responsibility is mainly linked with societal engagement because of the pronounced need to focus scientific research on needs of society.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>The RRI keys are popular in the research community and most researchers apply them, although they do not recognise them under these names. The only exception is ethics, which is formalised in various codes. When it comes to gender equality and other aspects of non-discrimination, these principles are mandatory, and the research community considers them a norm.</p> <p>In the field of science education, the university offers courses for adults who want to continue their education.</p> <p>UNWE is interested in engaging citizens in setting up research priorities, and it will consider appropriate methods for collecting the opinions of citizens regarding scientific and research objectives of the university.</p> <p>Regarding ethics, UNWE is planning to establish an ethics committee. While there are no specific policies pertaining to individual RRI keys, all five are addressed to a certain extent by the in-house documents dealing with research and educational activities.</p>

Relevance of AIRR dimensions to the stakeholder	<p>Anticipation and systematic analysis of social impacts of research is mainly performed by researchers. Business is also involved in this process to some extent.</p> <p>Inclusiveness is a well-developed aspect and focuses on experts and representatives of the research community. Citizens are usually engaged as research subjects, e.g. in surveys and other methods.</p> <p>Self-assessment is regularly performed, as it is a legal requirement to be conducted periodically. It includes a comparison with other research organisations in Bulgaria and abroad. Regular accreditation procedures require self-assessment and external evaluation with recommendations for the next programming period.</p> <p>UNWE is responsive and adaptive to new developments. For example, many current research projects deal with different aspects of digitalisation, such as human resources, new international business realities, new businesses trends. Consequently, priorities and work methods change over time in order to respond to the latest trends and developments.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>Digitalisation and news skills are essential for UNWE. The university was well prepared for the online education introduced in response to the COVID-19 pandemic, because it has been developing a hybrid model of education, with strong attention to the online segment, in the last 10 years.</p> <p>Support for innovation is also a very important aspect at UNWE as both lecturers and students at the university are aware that contemporary national economies are dependent on innovations in order to stay competitive and increase their GDP.</p> <p>Youth employment and entrepreneurship are main educational foci of the university. The university has a MA programme on cities of the future.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of experience in RRI ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	UNWE is one of the largest and most influential educational institutions in Bulgaria. It provides not only education but engages in research as well. Furthermore, its graduates make a career into various fields in the private and public sectors. UNWE is an important and influential actor that can contribute to the fastest adoption of the RRI principles and AIRR dimensions not only at academic institutions, but in all sectors where university graduates are active.
Website of the organisation	https://www.unwe.bg/



Name of stakeholder organisation: State University of Library and Information Technologies (ULSIT)	
Profile of the organisation	<p>The University of Library Studies and Information Technologies (ULSIT) is a state university, offering BA, MA and PhD programmes for the respective degrees. ULSIT has over 2,000 students and 150 lecturers. Graduates of ULSIT pursue careers in libraries, publishing houses, book-trading companies, the state administration and the information business, information centres and services, archive departments, museums, galleries and other cultural institutions.</p> <p>ULSIT has a rich publishing activity – monographs, the annual collection of “ULSIT Works”, a university newspaper and the scientific journal “Izdatel”.</p> <p>ULSIT is actively involved in the international cooperation in compliance with bilateral agreements with similar institutions in Russia, Germany, France, Poland, Serbia, Montenegro, Turkey, etc.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>The RRI concept is crucial for contemporary education and science, and represents an important driver of progress, as it allows adaptation to the rapid development of technologies. Universities need to be proactive and stay ahead of the innovation process.</p>
Relevance of RRI keys to the stakeholder	<p>All keys are relevant to ULSIT; however, these principles need to be analysed and applied within the context of the current digital transformation.</p> <p>Open access is one of the most important principles. It means openness to all groups of citizens, as science is funded by public money. Access to data needs to be provided by the administration at all levels.</p> <p>Research ethics is extremely important in relation to GDPR.</p> <p>Science education plays an important role in addition to STEM, entrepreneurship and technology are going to be critical for the future and responding to crises like the one caused by the Corona virus.</p> <p>Open schooling and systems of informal education are systems operating with the involvement of a variety of stakeholders. Education and communication happen not only in the classroom, therefore open educational resources (OER) become increasingly important, and there is an active interest in how they are used, distributed, funded, and made accessible to the wider public. Besides the question of responsibility (for OER), the certification of the knowledge and skills acquired through open schooling is also important.</p>
Relevance of AIRR dimensions to the stakeholder	<p>They are all important and there are numerous instruments to implement these dimensions in practice. What is needed in the</p>

	Bulgarian context is to align to and follow developments at EU level, i.e. to adapt the EU methods to the local context.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	The policy areas that are of relevance to ULSIT are digital transition and new skills , as well as youth employment and entrepreneurship . ULSIT offers BA, MA and PhD degrees to students in several fields such as Social Communications and Information Sciences, Informatics and Computer Sciences and National Security. Therefore, ULSIT has an important role within the territory as it equips with skills people, who enter the workforce in various fields of the economy after graduation. When research and academic activities at ULSIT are performed in line with the RRI keys and the AIRR dimensions, students will adopt this approach and will transfer it into their workplace, including the state administration, which is a potential career field of graduates.
Relevance of the stakeholder to objectives of RRI-LEADERS.	■ Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	Through getting involved in facilitating the adoption of the RRI keys and the AIRR dimensions, ULSIT could contribute towards the overall territorial governance to become more inclusive and responsive to the societal needs.
Website of the organisation	http://www.unibit.bg

■ Non-Governmental Organisations

Name of stakeholder organisation (and abbreviation): NGO Links	
Profile of the organisation	<p>NGO Links is a non-governmental organisation established in 2002 in Sofia.</p> <p>Its mission is to establish sustainable relationships in the field of local development, civic participation and empowerment of individuals and groups.</p> <p>The aim of NGO Links is to create an open space in which different experts and professionals meet and unite their skills.</p> <p>NGO Links relies on a combination of new ideas and accumulated knowledge to achieve lasting results and constructive dialogue between representatives of civil society, government and business institutions.</p>
Relevance of Responsible Research and Innovation to the stakeholder	The RRI framework is very relevant to the digital transition in the territory of Sofia Municipality. Digital transition is in the focus of NGO Links, which works very actively in this field (promotion of e-government and the use of open data at all levels of governance). NGO Links has performed numerous analyses of local administration,



	good governance practices, transparency and accountability. It was involved in the elaboration of the Vision for Sofia 2050.
Relevance of Responsible Research and Innovation to the stakeholder	<p>The RRI key most relevant for the work of NGO Links is open access to information and scientific results, followed by public engagement, gender equality and science education.</p> <p>Open access to data, scientific outcomes, and other information of relevance can lead to important and sometimes unexpected positive results and consequences. In terms of open access, even when it is related to software or proprietary data, public interest should prevail. Regarding public or stakeholder engagement, it is necessary to introduce tools to inform citizens and to organise virtual public consultations at the municipal level. Public engagement is crucial since administrations need to be aware of the problems of the citizens.</p> <p>Science education is important because policies have to be developed on the basis of scientific data. Today information and expert knowledge are more important than ever, and science needs to be integrated into the educational process.</p> <p>Research ethics is extremely important for public policies, it needs to be observed strictly irrespective of any other less important aspects (i.e., such as timeframe).</p>
Relevance of AIRR dimensions to the stakeholder	Since NGO Links serves as an intermediary between the different societal stakeholders in the process of policy design and implementation, all of the AIRR dimensions (anticipation, inclusion, responsiveness, reflexivity) are of high relevance to its activities.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	NGO Links is an organisation whose mission is based on the understanding that a strong civil society can be achieved only through the active involvement of empowered citizens in societal processes. According to NGO Links, sustainable results are stemming from the collaboration of civil society (the third sector), state institutions and businesses. As the organisation serves as an intermediary between these actors, it might have a central role across all chosen policy foci, however, its efforts are focused on promoting the e-government and the use of open data at all levels of governance. Therefore, the most relevant policy area for the organisation is digital transition .
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of interest in relation to RRI in practice ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR	NGO Links provides a forum for discussing various perspectives, gives opportunities for problem-solving, and ensures the needed experience in achieving a balanced and effective civil society. In its activities, it focuses on democratic values and mechanisms that

dimensions within territorial governance?	encourage individual participation and civic responsibility. Furthermore, its mission is to contribute to a strong civil society based on the active participation of citizens. Therefore, its activities contribute to the spread of the RRI principles as well as the AIRR dimensions.
Website of the organisation	http://www.ngolinks.eu/

Name of stakeholder organisation (and abbreviation): Rinker Centre	
Profile of the organisation	<p>Rinker Centre is a centre for entrepreneurship and training at the Bulgarian Charities Aid Foundation, established in 2014. Its mission is to support and develop entrepreneurship in Bulgaria. The Centre's programmes focus on creating opportunities for sustainable employment, increasing competitiveness, adding value and innovations and in this way aim to improve the quality of life in the country, mainly in the rural areas.</p> <p>The main activities of Rinker are targeted at developing the entrepreneurial culture among children and young adults. This is done by the provision of free trainings for acquisition of knowledge and skills for setting up a successful business.</p> <p>There are several training programmes available (e.g. training for young entrepreneurs; <i>Sprouts</i> – a competition for business ideas developed by children; social entrepreneurship competition targeting specific regions, sector or target audience; social entrepreneurship course at the Faculty of Economics and Business Administration at Sofia University). Rinker also runs a Resource Centre, providing information about social enterprises, case studies, statistical data and funding opportunities, and offering group and individual consultations.</p> <p>Rinker Centre further provides trainings for Bulgarian teachers, aiming to encourage the use of innovative technologies and interactive teaching methods, as well as trainings for work with students with special needs/learning difficulties and children from ethnic minorities.</p>
Relevance of Responsible Research and Innovation to the stakeholder	For Rinker Centre, inclusion of young people in research and innovation processes is crucial – it is essential to make them a part of the creative process, not just as recipients, but as creators. Certain elements of the RRI framework, such as openness, inclusion, engagement, ethics, are therefore very relevant for the Centre.
Relevance of RRI keys to the stakeholder	From the viewpoint of an innovative entrepreneurial project, the objective is to make the innovation process as open as possible and to include a wide variety of stakeholders. Ethics in this context would



	be related to making the process socially responsible, because innovation needs to have a positive effect on society at large. The best-case scenario when developing projects is to invest in initiatives that will not only return the investment but will also have a positive social impact. There are a number of projects in Sofia that support educational and entrepreneurial initiatives. Overall, the innovation eco-system requires the adherence to and the application of all five RRI principles to a certain degree.
Relevance of AIRR dimensions to the stakeholder	The AIRR dimensions are important for Rinker Centre because successful business development is related to the adoption and application of these dimensions. Since Rinker trains entrepreneurs on how to transform their ideas into operational businesses, the AIRR principles are discussed in the context of the development of viable business strategies.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	The activities of Rinker Centre are connected to youth employment and entrepreneurship as well as digital transition and new skills . As the team of Rinker Centre has the expertise in these areas, it might contribute to the development of the transformative outlook for Sofia by providing input, based on own experience.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	As already presented above, the primary activity of Rinker Centre is to train young entrepreneurs. Therefore, if the Centre engages in adopting the RRI principles and AIRR dimensions, it will thus promote them among the future Bulgarian entrepreneurs.
Website of the organisation	https://rinkercenter.org/en/

Name of stakeholder organisation (and abbreviation): Bulgarian School of Politics (BSoP)	
Profile of the organisation	Bulgarian School of Politics (BSoP) is an NGO established in 2001 as part of the Continuing Education Department of New Bulgarian University (NBU). It organises leadership training programmes for Bulgarian political and civic leaders. The training programme and certificates are accredited by NBU and credits count towards the MA programme in Political Management. BSoP is the co-founder of the network of schools of politics, managed by the Council of Europe. BSoP is also the co-founder of schools of politics in Northern Africa, in Morocco and Tunisia. It further runs political leadership programmes for the Western Balkan countries.



	<p>The School considers the level of citizen participation in policy-making as an indicator of the standard of democracy. Its mission is to support the creation of a community of civic and political leaders, who have an active role in political and public life on national, European and international level and are devoted to democratic values such as pluralism, tolerance, respect and democratic debate. Programmes adhere to and promote key democratic principles – tolerance, respect, democratic debate. Training methodologies are based on a framework developed by the Council of Europe.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>BSoP serves as a bridge between policy-makers, civic leaders/civil society and local communities. The School works to raise civic control in public policy development, to enhance the supremacy of law, to protect the freedom of speech, to support morality in politics and in the NGO sector, to introduce accountability and transparency in governance. Thus, RRI is highly relevant to the work and mission of BSoP.</p>
Relevance of RRI keys to the stakeholder	<p>BSoP has an ethics charter, which is binding both for the staff and the participants in the leadership training programmes, organised by the School. In case of breach of the charter, trainees could be excluded from the programme. Also, the programmes have training modules on issues like anti-discrimination, hate speech, children's rights. Responsible behaviour usually depends on personal moral values, therefore personal ethics is important for all actors in the R&I field. A large number of the Schools' alumni work in public office and their behaviour is publicly observed.</p> <p>Although all RRI keys are considered important to BSoP, the most important one is public participation. According to the information on the School's website, citizen participation on all levels of governance – from policy development to decision-making – is a guarantee for transparent and good governance. Because of that, the focus of the School's activities is on studying the European experience in the area of citizen engagement in decision-making, aiming to identify good practices and models for policy development. BSoP engages the public in public discussions, public fora, and advocacy to local government for carrying out public consultations.</p> <p>Open access to scientific results is also considered very important. All project-based reports, achievements and data are accessible by the general public.</p> <p>The principle of gender equality is pursued in all areas of the School's work.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is important in BSoP's work in order to have sustainable results with respect to political and civic leadership training. To this end, the School has strategic planning for five years ahead, including</p>

	<p>financial planning. Depending on specific circumstances, BSoP also responds to ad-hoc issues, e.g. organising debates on the Istanbul Convention.</p> <p>Inclusiveness is another important dimension in the work of the School. A variety of stakeholders are involved in the work process, ranging from members of parliament to citizens. BSoP also implements different initiatives such as advocacy campaigns for vulnerable groups and provides feedback from citizens to policy-makers. For example, in 2020, together with UNHCR-Bulgaria²⁰, BSoP created a Refugee Advisory Board, a consultative body comprised of refugees living in Bulgaria, so that they can be included in policy and decision-making initiatives regarding integration.</p> <p>Regarding self-assessment and self-analysis, BSoP has an annual evaluation at the end of each year, assessing the work of the organisation. In addition, ad-hoc assessments are also carried out.</p> <p>Responsiveness and adaptability are also implemented as BSoP is very flexible and adapts easily to the environment as well as to the changing needs of the target groups. For example, the leadership training programme is updated each year in response to the arising issues or the needs of the target groups. Therefore, flexibility is applied both at operational level and also at the level of training/programming design.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>Since BSoP trains national political and civic leaders, its importance within the territory is high as the values it promotes are observed by the alumni, most of whom pursue careers in public office.</p> <p>In relation to the policy areas, the ones that are most relevant for BSoP are youth employment and entrepreneurship, and digital transition and new skills. The drivers/needs for higher rates of youth employment and entrepreneurship in Sofia include:</p> <ul style="list-style-type: none"> ■ School education and family background, however, a new societal approach is needed for large-scale changes to take place. ■ Political parties and their policies, where there's a need to develop programmes to encourage young people to be more entrepreneurial. ■ More channels for information as well as programmes for early career advice are necessary.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of influence on RRI in practice ■ Stakeholders with high levels of interest in relation to RRI in practice

²⁰ UNHCR - UN Refugee Agency

How can stakeholder contribute to the adoption of RRI principles and AIRR dimensions within territorial governance?	<p>There are two main ways:</p> <ul style="list-style-type: none"> ■ since the School targets young political and civic leaders, the RRI principles and AIRR dimensions can be transferred directly into policy and decision-making through the trained young leaders; ■ as the School operates under the umbrella of the New Bulgarian University, these principles will be transferred to a certain extent to the university activities as well.
Website of the organisation	https://www.schoolofpolitics.org/eng/

Name of stakeholder organisation (and abbreviation): Foundation “The Duke of Edinburgh's International Award – Bulgaria”	
Profile of the organisation	<p>The Duke of Edinburgh's International Award is a global programme for non-formal education and training that challenges young people to be bold, celebrate their achievements and change the world around them. Through developing skills, cultivating a sense of adventure and volunteering, the Award helps young people to find their purpose, passion and place in the world. The Award is active in more than 130 countries and territories and although its framework does not change, irrespective of the state in which it operates, no two Awards are the same, because each young person designs and creates their own programme, unique to them. The Award is available to all young people between 14 and 24 years of age, regardless of their background, culture, physical ability or interests.</p> <p>Foundation “The Duke of Edinburgh's International Award – Bulgaria” was established in early 2014. Currently, the programme works with more than 60 schools and organisations in 27 cities in Bulgaria and with over 500 young people a year.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>Although not directly stated, an inquiry into the philosophy of the Foundation evinces that its objectives are based on some of the RRI principles, therefore, a conclusion that RRI is relevant to its activities, can be made. The Foundation perceives responsibility as an obligation to create proper conditions for developing and nourishing the potential of young people.</p>
Relevance of RRI keys to the stakeholder	<p>Public engagement is crucial for creating proper conditions for the development of policies. Policy elaboration is a process in which numerous stakeholders, such as young people, schools, businesses, should be involved in order to produce doable policies.</p> <p>Science education is enhanced as the Ministry of Education and Science has been paying increased attention to STEM in recent years and as a result, programmes have been reformed and improved. Different civil society organisations are also very active in this field.</p>



	<p>The Duke of Edinburgh's International Award subscribes to its code of ethics for working with young people. All schools and other organisations, which cooperate with the Award need to have and adhere to their internal rules and procedures for working with young people.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is very important as youth employment and entrepreneurship are not problems that can be solved once and for all, because different generations of young people face different challenges.</p> <p>Inclusiveness is also very important, because all relevant stakeholders need to be involved in the policy design in order to develop feasible policies.</p> <p>Self-assessment is ensured as the Foundation Duke of Edinburgh's International Award – Bulgaria makes an annual action plan, based on a three-year strategy. The plan is assessed twice a year in order to evaluate which activities are successful and should be given more attention and which need to be revised or cancelled as non-productive.</p> <p>The dimension of responsiveness/adaptability has been a crucial characteristic of the Duke of Edinburgh's International Award. The Foundation works globally, and it would be very difficult to make changes that would be appropriate for all of the involved countries. Nevertheless, due to good management, many internal processes and working methods were successfully changed in 2020.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The activities of the Foundation are related to youth employment and entrepreneurship as the primary objective of the programme is to help young people, aged 14-24, find their purpose and place in the world by developing their skills and cultivating their spirit for adventure and sense of volunteering in their community. Therefore, the employees of the Foundation are very well acquainted with the needs of youth in Bulgaria, as well as with the obstacles before this policy area.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<p>■ Stakeholders with high levels of interest in relation to RRI in practice</p>
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>The Foundation could engage in promoting the RRI and AIRR principles, most of which are the pillars behind its philosophy.</p>
Website of the organisation	<p>https://intaward-bg.org/</p>

Name of stakeholder organisation (and abbreviation): Maria's World Foundation	
Profile of the organisation	<p>Maria's World Foundation was established in February 2012 in Sofia, as a foundation acting for the public benefit. Its aim is to improve the quality of life of people with intellectual disabilities, including the life of their families, and help them achieve their full potential as individuals.</p> <p>The Foundation's objectives are focused on providing support to people with intellectual disabilities and their families by:</p> <ul style="list-style-type: none"> ■ Protecting their human rights. ■ Facilitating their social integration. ■ Overcoming discrimination and their social isolation. ■ Assisting them to realise their full potential as individuals by providing them access to high-quality services, developmental opportunities and possibilities for finding employment suited to their needs.
Relevance of Responsible Research and Innovation to the stakeholder	RRI could be a useful approach and help to establish an innovative approach in the provision of social services to people with intellectual disabilities and their families.
Relevance of RRI keys to the stakeholder	<p>Science in service of society can be achieved only through open access to resources, awareness raising, training and capacity-building.</p> <p>Public engagement is very important for the work of Maria's World.</p> <p>Gender equality is achieved into all the activities of the Foundation. When it comes to the Foundation's team, the work is overly feminised, which coincides with the trend in the whole social services sector in the country.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Reflexivity (self-analysis and self-assessment), is considered key as the management of the Foundation applies a quality-assessment cycle, including analysis and assessment of all activities within one calendar year using KPIs so that areas for improvement can be identified. There is an integrated system for evaluation of the Foundation's activities, which is based on consultation with their users. The Foundation publishes an annual report. There is an annual quality review of social services providers, which is focused on elaboration and submission of formal reports.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The two policy areas that are related to the Foundation's activities are innovation support and youth employment and entrepreneurship.</p> <p>When deliberating about youth policies and employment, it has to be noted that people with disabilities have huge potential, which is not currently used.</p> <p>As the Foundation's team has expertise in these two policy foci from the viewpoint of working with people with disabilities, it is able to</p>

	contribute to policy developments in these two areas that are including the special needs of this particular group of people.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	The Foundation collaborates with partners in social innovation and social entrepreneurship networks. It has also participated in a pilot group for developing a programme for social innovations at Sofia Municipality. The Foundation participates in networks of NGOs, which are providers of social services to vulnerable groups. Therefore, it can contribute by promoting the RRI and AIRR dimensions among these stakeholders.
Website of the organisation	https://www.mariasworld.org/en/

Name of stakeholder organisation (and abbreviation): Reach for Change Bulgaria	
Profile of the organisation	Reach for Change is an international non-profit organisation, founded in Sweden in 2010. It operates in 18 countries across three continents. In Bulgaria, Reach for Change Foundation has a mission to unlock the power of innovation and entrepreneurship in order to create a better world for children. It finds and helps social entrepreneurs with high potential to develop effective innovative solutions to pressing issues for children. Rather than providing only grants, Reach for Change supports these exceptional social entrepreneurs by helping them build up their organisational capacity, giving them start-up capital as well as providing them with access to a community of partners and other social entrepreneurs.
Relevance of Responsible Research and Innovation to the stakeholder	<p>Responsible innovations can be broadly understood to include forms of responsible support and responsible behaviour, where all stakeholders have specific responsibilities and duties. The concept of inclusiveness is the most appropriate when speaking about social and inclusive innovation.</p> <p>For Reach for Change responsible innovation means to include all groups that have the expertise on a given topic in the design of innovations.</p>
Relevance of RRI keys to the stakeholder	<p>Overall, all five keys are relevant, but they seem to have a different scope and application. Regarding the field of social innovation, public engagement, inclusiveness and research ethics are of highest importance, followed by science education and gender equality.</p> <p>Reach for Change has its own ethics charter. Regarding gender equality, the Foundation's statistics show that 60-70% of applications</p>



	(received each year) are from women. The typical profile of a social innovator in Bulgaria is a woman, between 30 and 40, university graduate.
Relevance of AIRR dimensions to the stakeholder	<p>Reach for Change has a competitive selection process, funding approximately 5% of all candidates. One of the inclusiveness practices is related to the introduction of children's jury, because children and youth need to have a voice in such initiatives/projects. The methodology was developed together with the National Network of Children in order to ensure it is child-friendly.</p> <p>Self-reflection/self-assessment is a process of ongoing adaptation, which is crucial for small organisations. Reflexivity and assessment at Reach for Change take place on an ongoing basis.</p> <p>Reach for Change has demonstrated responsiveness to the needs of the pandemic situation by creating a special edition of the annual programme for social innovators with adapting the rules and the selection process, which typically operates as an accelerator learning programme, lasting seven months. During the pandemic, the process was shortened to one month, the organisations were funded and the process of mentoring was pushed back so that organisations could start their projects.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The most relevant policy area for Reach for Change is youth employment and entrepreneurship. Digital transition and new skills as well as support of innovations (social innovations in particular) are also relevant.</p> <p>The activities of Reach for Change are very popular in the country, because they receive intensive media coverage by one of the major TV channels in Bulgaria, which is a media partner of the initiative. Therefore, in addition to supporting innovative social entrepreneurs, the organisation promotes social entrepreneurship among the wider public. Last, but not least, its experts are very well aware of the challenges in the field of youth employment and entrepreneurship.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholder with high levels of interest in relation to RRI in practice ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	Reach for Change supports social entrepreneurs during the development of their ideas into operational and successful social initiatives. In this role, the Foundation is able to contribute by promoting the RRI and AIRR principles into the social innovation eco-system.
Website of the organisation	https://bulgaria.reachforchange.org/bg/



Name of stakeholder organisation (and abbreviation): SofiaGREEN project	
Profile of the organisation	<p>The project “SofiaGREEN” was initiated by the Mayor of Sofia and Sofia Development Association in 2016 with the aim to coordinate and streamline all of Sofia Municipality’s policies, related to sustainable development. The objective was to: i) improve the overall quality of life of citizens and ii) put forward a successful bid for Sofia in the European Green Capital²¹ contest, organised by the European Commission.</p> <p>SofiaGREEN’s team is gathering information and conducting analysis across a variety of sustainability indicators in order to propose short-term and long-term measures for improving the city’s performance and the quality of life. Parallel to this activity, a number of pilot projects, related to air quality, mobility and waste management, are being executed.</p> <p>The objectives of the project include:</p> <ul style="list-style-type: none"> ■ Developing Sofia’s candidacy for the European Green Capital competition. ■ Promoting sustainable and green policies within Sofia Municipality. ■ Encouraging stakeholders to come together and engage in elaboration of solutions. ■ Improving the communication between the municipality and other stakeholders for green and sustainable development of the city.
Relevance of Responsible Research and Innovation to the stakeholder	<p>The RRI framework is relevant to the activities of SOfiaGREEN project. The team of SOfiaGREEN is working on creating a common database where open data will be freely available to the wider public. This initiative is still ongoing, but the data available in the database will be collected and stored in formats that will be applicable to the work of researchers, analysts and businesses.</p> <p>Data is also collected and compared as a result of the elaboration of the application of Sofia for the green capital competition. The next step is to make this data more widely available. This evinces that the RRI framework, especially the open access key, is of high relevance to the activities of the SOfiaGREEN project.</p>
Relevance of RRI keys to the stakeholder	<p>Public engagement is implemented as all the activities of SOfiaGREEN are oriented towards user-centred results. Their main purpose is to inform and engage the citizens in activities that will improve the quality of life in Sofia and make the city greener and more sustainable.</p> <p>Open access is widely supported. All the information about the activities and results is available on the project’s website.</p>

²¹ [The European Green Capital Award \(EGCA\)](#) is an initiative of the European Commission, aiming to reward cities that make efforts to improve the urban environment by creating healthier and sustainable living areas. Over 75% of the European population lives in cities, which poses great challenges for city authorities. Past winners of the EGCA include Stockholm, Hamburg, Copenhagen and Ljubljana.



Relevance of AIRR dimensions to the stakeholder	Anticipation, inclusiveness and responsiveness are important for the activities of the SOfiaGREEN project. Inclusion can be achieved in different ways such as discussing and identifying problems together with stakeholders. Public participation should be ensured in policy-making, policy implementation and in elaborating solutions. Inclusion is a continuing process in the whole policy cycle – from generation of ideas and development of policies to their implementation.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	Sustainable urban development is the main area the SOfiaGREEN project is focused on, but support for innovation, digital transformation and youth employment and entrepreneurship through start-up projects are also relevant foci for SOfiaGREEN. Since the project was initiated by the Mayor's office and is being implemented by the municipality's resource centre for research, analysis and innovations, namely Sofia Development Association, it has a primary importance within the territory in the context of the selected policy foci within the RRI-LEADERS project.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of influence on RRI in practice ■ Stakeholders with high levels of power
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	As the project was initiated by the Mayor of Sofia and is being implemented by Sofia Development Association, which encourages the dialogue among civil society, businesses, Sofia Municipality and academic institutions, the team of SOfiaGREEN has the opportunity to promote the adoption of RRI principles and AIRR dimensions in their work.
Website of the organisation	https://www.sofia-da.eu/en/current/project-%E2%80%9Csofiagreen%E2%80%9D.html

■ Business

Name of stakeholder organisation (and abbreviation): Health and Life Science Cluster Bulgaria (HLSCB)	
Profile of the organisation	<p>The Health & Life Science Cluster Bulgaria is a non-profit organisation which unites innovative companies operating in the field of life sciences and health, such as businesses in drug discovery, genetic research, 3D human tissue printing, software solutions for medical and outpatient care, drug manufacturing, nutrition supplements, green technologies, bio-based technology, food-tech, agri-tech, etc.</p> <p>The cluster facilitates relationships and promotes cross-disciplinary and international partnerships in order to strengthen innovation activities within life sciences.</p> <p>The Cluster:</p>



	<ul style="list-style-type: none"> ■ Catalyses innovation by facilitating cooperation between public and private stakeholders within life sciences. ■ Brings smaller companies into the spotlight and inspires cross disciplinary collaborations and public-private synergy. ■ Supports the development of professional competences in innovation and foresight. <p>The Cluster participates in the Management Boards of the Bulgarian Bioscientific Society and the Bulgarian Employers' Association for Innovation and Technology (www.brait.bg).</p>
Relevance of Responsible Research and Innovation to the stakeholder	The RRI framework could provide an adequate response to several challenges the HLSCB cluster is facing. The RRI concept could be further expanded to include the local context for supporting entrepreneurship, development of spin-offs, and intellectual property protection.
Relevance of RRI keys to the stakeholder	<p>The mission of the HLSCB Cluster is to improve quality in health treatment and care by enhancing the members' capabilities to develop and put on the market world-class health care solutions.</p> <p>The Cluster facilitates confidence-building in interpersonal relations to fulfil the needs of its stakeholders for strengthening innovation through cross disciplinary and international partnerships. HLSCB also strives to bring smaller companies, public/private synergy and internationalisation into the spotlight. Therefore, stakeholder and public engagement is a highly important aspect of its work.</p> <p>Support for the development of professional competences of the Cluster members is another objective of HLSCB. In this way, the Cluster contributes to science education in the area of life and health sciences.</p> <p>Collection and access to data is crucial for successful development of innovations in the health care sector.</p>
Relevance of AIRR dimensions to the stakeholder	<p>All of the AIRR dimensions are important for the governance of research and science in digital transition, biotech and healthcare, but other aspects are also important, namely:</p> <ul style="list-style-type: none"> ■ Awareness of existing problems and issues. ■ Scalability, long-term strategic planning, predictability (as part of anticipatory governance). ■ Targeted investments within three- to five-year time-frames.
Importance of the stakeholder within the territory in the context of chosen policy focus	As the Cluster is involved with innovations in health, biotech and artificial intelligence, its activities are related to the policy focus of digital transition and skills, innovation support and youth employment and entrepreneurship . Apart from its members, HLSCB works with Sofia Municipality and Sofia Tech Park.
Relevance of the stakeholder to objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of influence on RRI in practice in companies in health and life sciences

How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	The cluster provides a meeting point of businesses, working in the field of health and life sciences. Therefore, it has the ability to promote the adoption of the RRI principles and AIRR dimensions in their company practices.
Website of the organisation	https://www.biocluster.bg

Name of stakeholder organisation (and abbreviation): Electric Vehicles Industrial Cluster (EVIC)	
Profile of the organisation	<p>The Electric Vehicles Industrial Cluster (EVIC) was registered as a cluster organisation in November 2009. It was established by seven Bulgarian companies as the first industrial association for electro mobility in the country. EVIC supports its members in their industrial, technological, business and strategic development, to propose legislative changes, and to provide higher and vocational education and training. EVIC is a member of the Bulgarian Industrial Association.</p> <p>The objectives of EVIC include:</p> <ul style="list-style-type: none"> ■ To create and develop the electro-mobility sector in Bulgaria. ■ To support new industries in order to raise the competitiveness of European and world markets in the sector of electrical mobility. ■ To unite the efforts of its members to set up National Charging Infrastructure – BULCHARGE. ■ To cooperate with public bodies to introduce rules, norms and standards in the sector. ■ To contribute to setting up sustainable educational models. ■ To integrate renewable, hydrogen and energy-saving sources. ■ To ensure the sustainable competitiveness of EVIC's members. ■ To introduce electric buses as mass urban transport. ■ To implement industrial investment projects for technological renewal and innovations, aiming to reduce the energy intensity of transport schemes. ■ To develop investment projects, aiming to increase energy efficiency and to introduce the production of alternative energy. ■ To support the protection of the environment according to national and regional priorities and EU requirements.
Relevance of Responsible Research and Innovation to the stakeholder	<p>Although EVIC does not perform R&D by itself, the objectives of the organisation are closely related to research and innovation in the field of electro mobility, therefore, the RRI framework is relevant to its activities as well as the activities of its members.</p> <p>Responsibility for EVIC means following strict standards for quality, technical specifications, requirements for the new type of mobility in a fair business environment.</p>



	EVIC has internal regulations that allow cluster members to cooperate effectively. Each year EVIC gives an award for high achievements.
Relevance of RRI keys to the stakeholder	<p>All five RRI keys are important to EVIC. Stakeholder engagement is essential, because one of EVIC's priorities is to connect the main actors, namely business, academia and public administration, and to initiate a dialogue among them in order to develop a common vision and priorities, as well as to co-design policies in the field of electro mobility.</p> <p>Open access is necessary for managing the e-mobility infrastructure and networks, because these electronic systems require open source software and open data in order to be able to link e-mobility with the other transport modes.</p> <p>Ethics and gender equality are important when deliberating issues in the field of environment/ecology, which is closely linked to the electrical mobility sector.</p> <p>Science education is key for overall business progress across all sectors, including the electrical mobility area as well.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Since electrical mobility is a new sector, anticipation, inclusiveness, reflexivity and responsiveness are all important for its proper development and sustainability over time. A long-term vision on how to innovate and how to use innovations from other sectors is needed. Different decision-making methods are applied by businesses and public authorities and collaboration among them is of crucial importance. Organisations like EVIC need to be consulted by the municipal authorities when sector-specific policies are being developed.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>Since e-mobility is directly linked to sustainable urban development, EVIC is an important stakeholder in this context.</p> <p>In the area of youth employment and entrepreneurship, the cluster cooperates with academia in order to develop educational programmes that will lead to skilled workforce. In cooperation with the Ministry of Education and Science, EVIC is implementing vocational training programmes in high schools, aiming at preparing young people for the new jobs needed in the electromobility sector.</p> <p>EVIC also promotes and supports the innovation activities of its members and works with technology developers in order to build a system of charging stations.</p> <p>To create digital transformation and acquisition of new digital skills that are required for each segment of the e-mobility system, elements of the system, such as (smart grids, e-vehicles, charging systems, should be linked in order to encourage investments.</p>

Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of interest in relation to RRI in practice ■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>By adapting RRI principles and AIRR dimensions, EVIC can contribute to development of Sofia municipality in the following ways:</p> <ul style="list-style-type: none"> ■ the cluster members are Bulgarian companies, developing strategic innovations, and as such their adherence to the RRI principles is of primary importance for the whole innovation eco-system and the society and will lead to a more transparent, inclusive and ethical R&D process; ■ representatives of the scientific and educational community, including the Bulgarian Academy of Sciences, participate in EVIC and thus, the cluster could promote RRI into this community as well; ■ EVIC cooperates with public authorities in order to establish rules, norms and standards in the electric vehicles industry, which is an opportunity to promote the acceptance of the RRI principles and develop policies that are in line with the RRI principles and AIRR dimensions.
Website of the organisation	http://www.emic-bg.org/?lang_id=2

Name of stakeholder organisation (and abbreviation): Innovation Capital	
Profile of the organisation	Innovation Capital is a venture capital fund, established to provide access to equity and quasi-equity funding to start-ups in Bulgaria. The organisation focuses on key high-priority sectors in the local economy with high potential for disruptive and scalable innovation. Innovation Capital supports the transformation of these sectors through professional innovation management in high-potential start-up and scale-up businesses. The end goal is to grow these businesses to scale and to establish integration with renowned international companies and innovation leaders.
Relevance of Responsible Research and Innovation to the stakeholder	Innovation Capital supports innovative start-ups, where the application of the RRI framework is perceived of primary importance, therefore, in this specific context, RRI is relevant to Innovation Capital as well.
Relevance of RRI keys to the stakeholder	Ethical standards are applied rigorously in the selection of projects, supported by Innovation Capital. No support is provided to initiatives that could have a detrimental effect on society, environment, people or cause harm in any other way.



	<p>All supported projects have a pronounced engagement aspect. A wide range of stakeholders are directly involved either as members of the project evaluation jury, as participants, or they provide feedback.</p> <p>The educational aspect is also present, because work on a project always involves acquisition of new knowledge.</p> <p>Gender-based discrimination is not possible, and whether a project is managed by a woman or a man is not important.</p> <p>Overall, all RRI principles are present to a great extent, either formally or informally, in the work processes and practices at Innovation Capital.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Anticipation is obligatory for research and innovation – it is essential to be able to look forward and anticipate possible pathways for future developments. When Innovation Capital assesses a project, this is not done only in the Bulgarian context, but is compared to the global situation. This is important to establish the gap (or delay) between Bulgaria and other countries and to understand the global development trends.</p> <p>Inclusiveness is also an important aspect. The more open and inclusive the processes are, the better the chance to deliver applicable and meaningful policies that can produce a real impact. Innovation Capital team has regular presentations and trainings in different cities across Bulgaria, meeting the local eco-system stakeholders, and establishing contacts.</p> <p>Reflection involves using different KPIs and is closely related to principal managerial skills. Innovation Capital always brings the attention of their beneficiaries to the importance of self-assessment and self-reflection.</p> <p>Responsiveness/adaptability are important – policies should be discussed and coordinated with beneficiaries they are targeting.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>The most relevant to the activities of Innovation Capital policy areas are digital transition, support to innovation and youth employment and entrepreneurship. The RRI keys that are important for these policy fields are open access and research ethics, followed by science education.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of experience in RRI ■ Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>Innovation Capital's role in facilitating the adoption of the RRI principles and AIRR dimensions is related to the fact that it supports innovative Bulgarian start-up companies in key high-priority sectors of the economy with high potential for disruptive and scalable innovation. Therefore, promoting these principles among innovative start-ups will</p>

	lead to their endorsement by other actors in the business and innovation eco-system in the country.
Website of the organisation	https://www.innovationcapital.bg

Name of stakeholder organisation (and abbreviation): Virtech Ltd.	
Profile of the organisation	<p>Virtech is a research and development company specialising in applications of the advanced information and communication technologies. The company applies the knowledge and experience of international research and development into a wide range of services, consultancy, training and developments.</p> <p>Its competences are smart sensors, cloud computing and Internet of Things (IoT) services; smartphone and tablet applications; serious gaming and interactive multimedia design and development, storytelling tools; digital repositories implementation and enrichment with semantic-based innovative services; data mining and business intelligence; e-learning and competence development methodology, tools and services.</p>
Relevance of Responsible Research and Innovation to the stakeholder	The RRI framework is an important driver of progress and contributes to adapting to the rapid technological development. RRI can help companies to be proactive and stay ahead of the innovation process, improving their competitiveness.
Relevance of RRI keys to the stakeholder	<ol style="list-style-type: none"> 1. Wide inclusion of all stakeholders is important in the process of software development for Virtech. The agile model of product development requires that end users and stakeholders are involved in co-creation and co-design from the get-go. 2. Research ethics is considered critical especially when third parties are involved in data sharing, which is also a question of data security and responsibility. 3. Open access is vital for Virtech, emphasising the need for administrations to provide open access to data is key to economic development and experimentation.
Relevance of AIRR dimensions to the stakeholder	All AIRR dimensions are important and there is a variety of instruments to implement them. What is needed in the Bulgarian context is the aspiration to align with and to follow developments at EU level.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	For Virtech, the most relevant policy area is digital transformation , because the company is a leading partner in VirtSOI LL – the Virtual Services and Open Innovation Living Lab. The Lab was established in Sofia in 2008 in partnership with the Centre of Information Society Technologies at Sofia University, the Institute of Technology and Development and eight more professional associations and NGOs in

	<p>the ICT field. VirtSOI LL has been a member of the European Network of Living Labs since 2008. According to the website of the living lab VirtSOI Living Lab: Virtual Services and Open Innovation (Sofia) (virttech-bg.com), VirtSOI LL aims to integrate a broad vision for development and implementation of virtual services in the following areas: e-Learning, e-Work, e-Government, e-Health, e-Business, e-Content, e-Inclusion, Mobile Technology Applications, Web 2.0 and Virtual Worlds, Open Innovation, Interoperability and Security, Knowledge Management; ICT for Sustainable Development, etc. The objective of VirtSOI LL is to become a marketplace platform for both providers and seekers of regional innovation/expertise. After maturing enough, its aim is to become an incubator for service-oriented living labs, targeting various public and industrial sectors.</p> <p>In addition, since Virtech is an R&D company, which specialises in applications of the advanced ICT, it contributes to the overall digital transformation and youth employment.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	Virtech has a large network of partners and could promote the RRI-AIRR framework to them, thus enhancing their innovation activities adhering to the principles of stakeholder engagement, research ethics and open access.
Website of the organisation	http://www.virtech-bg.com/

Name of stakeholder organisation (and abbreviation): Microsoft Bulgaria	
Profile of the organisation	Microsoft Bulgaria, established in 1999, is the Bulgarian branch of the global IT giant. The company develops, manufactures, licenses and supports a variety of computing products used by consumers and businesses. Microsoft Bulgaria is the biggest investor in Bulgarian education from the private sector.
Relevance of Responsible Research and Innovation to the stakeholder	Microsoft has a specialised unit for research, development and innovation activities. In recent years, the company has focused on educational technologies, targeting various learning disabilities. For example, lately the company has been working on immersive technologies in order to support learners with educational deficits and special needs such as dyslexia, kids with cerebral palsy, etc. Microsoft is proactive in this respect, and it is a market leader in such technologies, aiming to respond to public needs immediately.



	<p>In 2020, due to the COVID-19 situation, Microsoft has focused on online education and especially the Teams platform, which was primarily used as a business platform, but was rapidly transformed to aid online schooling and teachers.</p> <p>Furthermore, the company is aware that it cannot succeed without collaborating with universities and businesses. Regarding responsibility, the company's compliance policies are stringent. Microsoft has always been an extremely responsible and reliable partner.</p>
Relevance of RRI keys to the stakeholder	<p>Public engagement has always been important for Microsoft. The company is working with many organisations, constantly consulting with various stakeholders on how to design and improve software. In addition to developing software for teachers and students, the company is also leading global initiatives for digital skills for parents.</p> <p>Open access to data is also very important.</p> <p>Gender equality is important for the company on all levels.</p> <p>The view of Microsoft is that making science accessible by making scientific language understandable to the general public is important in order to improve the overall public literacy about technologies and digital tools.</p> <p>The most important ethical concerns at Microsoft are related to making all research and innovation results public. Policy-makers need to have access to this information. Publicity, transparency, protection of personal data and security of information are key values to which the company adheres. Microsoft has a strategy for corporate social responsibility, Microsoft Citizenship, which includes objectives like becoming a carbon-free company, making responsible use of resources and sustainable development measures.</p>
Relevance of AIRR dimensions to the stakeholder	<p>All of the AIRR dimensions are important for Microsoft in order for the company to stay competitive on the global market. However, the focus is on anticipation (e.g. the company's innovation strategy) and inclusiveness, especially with regard to the corporate business strategies, which are developed with the involvement of external stakeholders. Microsoft usually engages public figures and organisations in designing programmes and documents such as the Global Training Partners Programme, where all international partners of the company are involved.</p> <p>In addition to external stakeholders, Microsoft also involves its employees in strategy development. The company is regularly asking staff members for feedback. Moreover, employees are engaged in the process of developing both strategies and products. This is executed through cycles of internal testing, evaluation and validation of products and processes.</p>

Importance / role of the stakeholder within the territory in the context of the chosen policy focus	As an IT company, Microsoft is of huge relevance and is very interested in digital transformation . Furthermore, as it is involved in educational technologies, it has a well-formulated position on educational policies .
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> ■ Stakeholders with high levels of interest in relation to RRI in practice ■ Stakeholders with high levels of experience in RRI
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	As Microsoft is one of the biggest companies in the IT sector, it can serve as a good practice example to other businesses, especially in the IT field. Although not formally adopted as part of the company's policy, the RRI principles play an important role in Microsoft, above all, open access and ethics. Microsoft's strategy for corporate social responsibility (Microsoft Citizenship) can be highlighted as an excellent example of adoption of RRI principles in the business sector.
Website of the organisation	https://www.microsoft.com/bg-bg

Name of stakeholder organisation (and abbreviation): Bulgarian Start-up Association (BESCO)	
Profile of the organisation	<p>The Bulgarian start-up association (BESCO) is a non-governmental organisation that acts as a bridge between start-ups, private and institutional investors, the government and other stakeholders.</p> <p>BESCO's mission is to upgrade existing Bulgarian legislation with contemporary market-based policies, focusing on innovation. BESCO's team believes that the Bulgarian economy should be shaped by activities, which are based on R&D, innovation and entrepreneurship.</p> <p>To achieve its vision, BESCO is involved in:</p> <ul style="list-style-type: none"> ■ Developing and strengthening start-up incubation in Bulgaria. ■ Working with public institutions, making recommendations for policy developments, proposing legislative changes (e.g. a start-up visa for entrepreneurs from third countries, willing to start their innovative business in Bulgaria). ■ Creating a supportive environment and community of start-up businesses. ■ Offering multi-level support to the start-up community. <p>Last, but not least, BESCO offers membership to Bulgarian companies from various economic fields, thus creating a network of proactive and successful businesses, which get the opportunity to network with each other, to support innovative and progressive legislation that aims to improve Bulgaria's economy as well as to get access to value-added services, such as lawyers, consultations with accountants with experience in working with start-up companies, media contacts,</p>



	contacts with PR and marketing agencies, references to funds and angel investors, ad-hoc services and offers from partner organisations.
Relevance of Responsible Research and Innovation to the stakeholder	Although BESCO has no innovation activity by itself, the association is involved in different research projects. For example, recently BESCO conducted a research on entrepreneurship education in 15 Bulgarian universities. Furthermore, one of the major objectives of BESCO is to support innovative start-ups, which are engaged in R&D and innovation activities and it is in this regard that RRI is relevant to its activities.
Relevance of RRI keys to the stakeholder	<p>Public engagement is very important to BESCO and because of that, its team constantly communicates with stakeholders (seeking feedback from partners, policy and decision makers, the National Assembly, the municipality, representatives of political parties and the industry sector, with regard to their policy and legislative initiatives.</p> <p>Open access is crucial – information is shared internally and externally with other interested parties. BESCO also encourages sharing among the organisation’s members.</p> <p>There are no problems regarding gender equality in BESCO.</p> <p>Science education is important in the long-term. BESCO is focused on supporting science-based innovations.</p> <p>The <i>Start-up Bushido</i> is the ethics code of BESCO. Ethics is key to BESCO’s success. The most important criterion for accepting new members is the ethical behaviour and responsibility of the company. BESCO requires companies to follow strict ethical principles in their work. If a company wants to become a member, it first has to confirm its adherence to the ethics code by signing it.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Inclusiveness and responsiveness are very important aspects in BESCO’s activities. Regarding self-assessment/reflexivity, it is performed during weekly office meetings. There is an Advisory Board meeting on a quarterly basis, where BESCO reports its achievements and gets feedback from the Board.</p> <p>Another important aspect is related to evaluating the future social impact of innovations. At organisational level, BESCO follows three basic criteria:</p> <ol style="list-style-type: none"> 1. Identification of the needs of the start-up environment/system. 2. New trends in the field internationally. 3. Consultations with the organisation’s members.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	BESCO is an important stakeholder in Sofia, because many of the successful businesses in the city are its members. Moreover, it supports innovative start-ups with potential to become successful businesses, dealing with innovations and R&D in various economic sectors. Also, it works with relevant public bodies/institutions and other actors in the innovation system. In its role as a bridge and a mediator between all

	these stakeholders, it has a central role in the eco-system. Being such an important player, BESCO is able to contribute to policy developments in the innovation support and the digital transformation policy areas, which are the two policy foci, relevant to its activities.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	■ Stakeholders with high levels of influence on RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	BESCO acts as a bridge between start-ups, private and institutional investors, the government and other stakeholders in the innovation industry. It has the capacity to promote RRI and AIRR principles among all these actors, thus contributing to the spread of the RRI principles and AIRR dimensions within the whole innovation eco-system, including relevant state institutions.
Website of the organisation	https://besco.bg/

Name of stakeholder organisation (and abbreviation): Lime	
Profile of the organisation	<p>Lime is a company, based in San Francisco, USA, offering the shared use of light e-vehicles such as mopeds, scooters and bikes in various cities around the world, including Sofia.</p> <p>The innovation activities of the company are focused on the development of new products. Lime's innovation strategy is linked to its business plans as well as the development and marketing of new products.</p> <p>The research team of Lime is based in China.</p> <p>In April 2021, Lime was listed by the "TIME" Magazine as one of the 100 Most Influential Companies of the year.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>Responsibility is defined as being aware of the latest trends and challenges in the urban policies and develop innovative products and services that can answer these challenges. Responsibility for Lime also means to lead information campaigns regarding safe use of their products as an answer to concerns in the society and municipal administration regarding the safety of e-scooters.</p> <p>Corporate-social responsibility of Lime is at the focus of the company's commitment and obligations towards the city of Sofia. For example, as part of the efforts to limit the spread of COVID-19, Lime temporarily suspended its scooter service.</p>
Relevance of RRI keys to the stakeholder	Only one RRI key is fully relevant to Lime, namely stakeholder engagement . The city administration is Lime's most important



	<p>stakeholder as the company's products are used in public spaces, and their safe usage is an important public concern. Lime involves a variety of other stakeholders to inform the public where and how to use the scooters safely and responsibly.</p> <p>The main ethical issues are related to the safe use of scooters and the protection of the environment, e.g., recycling of electrical batteries of scooters. Also, Lime has an internal code for employees about working with hazardous materials and substances.</p>
Relevance of AIRR dimensions to the stakeholder	As a high-tech company, Lime considers anticipation to be an important dimension so that the company can develop new products that are in line with future trends/developments. For Lime, anticipation is related to urban development and societal needs, and it is crucial for the company in order to stay ahead of potential competition and continue being the leader in its market niche.
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	The most relevant area for Lime is sustainable urban development . Lime's importance for Sofia is in its proactive market position, as the company is changing the overall environment and introducing new ways of thinking and doing things. For example, Lime was the first company that introduced the shared use of light e-vehicles to the Bulgarian market. Furthermore, its mission is to reduce car travel, thus improving the quality of life and ensuring the protection of the environment. Lime contributes directly to making Sofia a greener and cleaner city, which coincides with the goal for sustainable urban development.
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<ul style="list-style-type: none"> Stakeholders with high levels of interest in relation to RRI in practice
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	As the company operates in more than 120 cities in about 30 countries, it has the capacity to promote the RRI and AIRR principles not only in Bulgaria, but worldwide. Locally, by being a proactive game changer, it is able to enhance the application of RRI and AIRR principles, thus influencing positively the whole innovation eco-system.
Website of the organisation	https://help.li.me/hc/bg

Name of stakeholder organisation (and abbreviation): Obecto Digital Cooperative	
Profile of the organisation	<p>Obecto is fast-growing and entrepreneurial software development digital cooperative based in Sofia. It was founded in 2008, based on the belief that software development should be more than a way of delivering features, but should bring valuable change to the world. Its team consists of world-class professionals in building software products for a large variety of start-ups and companies around the world. Obecto is driven by the passion to create amazing technology and solve complex problems.</p> <p>Obecto has a structure governed by transparency, in which decisions are taken with solid arguments and the voice of the team.</p> <p>Obecto is not only developing software, such as web, mobile, gaming, big data and machine learning software products, for their clients, start-up companies, but also acts as their strategic partner, investing in their success. By sharing the risks, Obecto creates a relationship where both parties are fully invested in the success of the venture. Obecto's team assists the start-ups in the development of their business idea, and then collaborates with them until the idea turns into a profitable activity.</p>
Relevance of Responsible Research and Innovation to the stakeholder	<p>Obecto carries out innovation activities – it has a unit responsible for innovations and a research team, which is focused on cutting-edge IT solutions and products. Obecto has clearly formulated innovation objectives, which the team aims to achieve. These objectives are also aligned with new developments in the field.</p> <p>Its experts are authors of scholarly publications. They cooperate with the Bulgarian Academy of Sciences (BAS) and its Summer Research School. Experts from Obecto are student mentors participating in international competitions. Therefore, RRI is very relevant in the context of Obecto's activities.</p>
Relevance of RRI keys to the stakeholder	<p>Overall, all RRI keys are relevant and followed by the company.</p> <p>The most important one is science education. Obecto and BAS are partners in the Summer Research School – a programme for school students. Many of the students are involved in the development of innovations in the company. Also, Obecto has signed a formal agreement with BAS for the development of a school science centre.</p> <p>No major ethical challenges have been identified at Obecto so far. The company strives to develop solutions/innovations in ways that reduce potential damage.</p>
Relevance of AIRR dimensions to the stakeholder	<p>Inclusiveness is practiced at Obecto by engaging its employees in developing innovation and research strategies. The mechanism of distributed knowledge is very important – the company follows this principle and knowledge is shared among team members.</p>

	<p>Communication between all units is crucial. Business goals are discussed, and decisions are taken with the participation of the whole team.</p> <p>As it relates to assessing future social impact of innovations, the philosophy of Obecto is decentralisation, and team member has personal responsibility.</p>
Importance / role of the stakeholder within the territory in the context of the chosen policy focus	<p>Youth employment and entrepreneurship, support for innovation, and digital transformation are all policy foci that are relevant for Obecto's activities.</p> <p>Obecto's relevance stems from the fact that it mobilises young entrepreneurs who are very proactive and do not seek only profit but are committed to making a positive impact. Furthermore, the company treats its customers as partners and shares the risk of their venture. Obecto makes a profit only when the founders of the company they are working with makes a profit, which is a business model that has included not only market-based objectives, but a positive social element as well. Thus, Obecto contributes to the development of the entrepreneurship culture in Sofia by ensuring support to youth employment and entrepreneurship, innovation development and digital transformation.</p>
Relevance of the stakeholder to the objectives of RRI-LEADERS.	<p>■ Stakeholders with high levels of influence on RRI in practice</p>
How can stakeholder contribute to the adoption of RRI principles and the AIRR dimensions within territorial governance?	<p>As Obecto is a software development company, involved in developing innovations, it is important to adhere to the RRI principles. Some of them, especially science education and inclusiveness, are prominent in Obecto's practices. To further enhance such practices, Obecto might institutionalise them by developing a formal strategy, including the RRI and AIRR aspects, which will potentially lead to their promotion within their partners.</p>
Website of the organisation	<p>http://www.obecto.com/</p>

Annex Mapped RRI good practices

Mapped RRI good practices in the Sofia Municipality

Good Practice: Young Visionaries Academy	
Owner of the practice / responsible organisation or institution: Sofia Municipality, Sports and Youth Activities Directorate	
About the practice	<p>The Young Visionaries Academy is an initiative of the Sports and Youth Activities Directorate at Sofia Municipality, aimed at making young people live, study and work on the territory of Sofia.</p> <p>The Academy was established in 2020 in order to support young people aged 15 to 29 to develop their own projects, focused on socially significant problems, and to propose their solutions. The Academy functions as an incubator of innovative ideas from young people for the community. The programme offers to the participants mentoring from experts and practitioners in various fields, helping them to conceptualise and implement their projects. Interested participants submit their ideas to the Academy and are selected through an open call for applications.</p> <p>The best projects created within the Academy receive funding for implementation. Throughout the entire cycle – from project idea to implementation, dissemination and visibility, the young people are supported by their mentors and the team of the Sports and Youth Activities Directorate. The mentoring and training activities are carried out with the support of SofiaLab and Sofia Development Association.</p> <p>Five thematic areas have been identified for the participants in the Academy: Ecology and urban environment; Sport and health; Art, culture, education and science; Civic and health education and media literacy; Support for disadvantaged people, risk groups, animals at risk.</p>
Policy area of the practice	Youth entrepreneurship, new skills, sustainable urban development
Main objective of the practice	To provide young people in Sofia with an opportunity to engage in civic initiatives, to inspire and motivate them to learn and acquire new skills in order to fulfil their potential.
Geographical scope of the practice	Sofia / Sofia Municipality
Stakeholders involved	Sports and Youth Directorate of Sofia Municipality, SofiaLab, NGOs and civil society organisations active in the thematic areas of the initiative
Relevance to RRI keys (Research ethics, Public engagement, Science)	Public engagement, gender equality, science education

education, Gender equality, and Open access)	
Relevance to AIRR dimensions (Anticipation, Inclusiveness, Reflexivity and Responsiveness)	Inclusiveness, reflexivity, responsiveness
Status of the practice	The initiative started in 2020; the first cycle ends in the summer of 2021.
Benefits of implementing the RRI practice	The practice falls in line with the Youth Strategy 2017-2027 ³¹ of Sofia Municipality. It aims to consolidate the efforts of Sofia Municipality to engage with young audiences, through a bottom-up approach, where the beneficiaries are also the actors of change. The Academy is a good example of a multi-stakeholder engagement: initiated by the municipal administration, the practice is implemented in close cooperation with schools and NGOs on the territory of the Sofia city.
Compatibility with the planned transformative outlook	The projects that the Academy supports focus on creating social impact by addressing the global challenges that young people face today, but localised in the context of their schools, peers, and communities. The priorities of the programme also address the goals and main objectives of strategic documents of the city in the field of education, digital transformation, and urban development.
Further information (link to websites, reports, press coverage)	https://ysoxubp3sbgbhrfgr3xfbzfc-adv7ofecxzh2qqi-www-sofia-bg.translate.goog/youth-activities http://youthub.bg/2020/11/akademiy-a-za-vizioneri-april-maj-2021g-sofiya/

Good Practice: SofiaLab	
Owner of the practice / responsible organisation or institution: Sofia Development Association	
About the practice	SofiaLab opened in September 2018, with support from the project “New Generation Skills”, funded by INTERREG Danube and Sofia Municipality. Since then, over 6000 people have participated in events organised by the Lab. The primary goal of SofiaLab is to support the improvement of the digital, creative and entrepreneurial skills of young people in Sofia.

³¹ Sofia Youth Strategy 2017-2027, https://www.sofia.bg/documents/20182/448750/Strategy_young_people-SO-2017-2027.pdf/8186ee54-8135-42e0-bfa2-17dd2b281742 (in Bulgarian)



	<p>SofiaLab is the only member of the European Network of Living Labs (ENoLL)³² from Bulgaria (since 2019). The Living labs are defined as user-oriented, open innovation eco-systems based on co-creation – an approach that integrates research and innovation processes in real life. The Living labs are platforms driven by practical challenges that facilitate and encourage open and collaborative innovative solutions. They also provide meetings or arenas in real life where both open innovation and consumer innovation processes can be studied, experimented with, and new solutions can be developed. The Living Labs act as intermediaries for citizens, businesses and research organisations, together with local authorities, for joint value creation, rapid prototyping or validation to enhance innovative solutions.</p>
Policy area of the practice	Youth entrepreneurship and employment, digital transition and new skills, support for innovation, sustainable urban development
Main objective of the practice	<p>SofiaLab's philosophy is based on four main pillars of intervention: Debate, Learn, Innovate and Demonstrate, in order to develop a vibrant eco-system of learning and innovation in the city. Its objectives include:</p> <ol style="list-style-type: none"> 1. To support the activities of Sofia Development Association in the implementation of Sofia RIS3 strategy. 2. To support the implementation of the Youth Strategy of Sofia Municipality. 3. To provide opportunities for policy development, testing and implementation, following the quadruple helix model. 4. To provide a forum for challenge-based learning, experimentation, co-creation and innovation in Sofia, in fields related to urban development, innovation, digital transition, and youth engagement.
Geographical scope of the practice	Although SofiaLab is involved in many international projects, it primarily aims to provide opportunities for learning and innovation to young people in Sofia Municipality.
Stakeholders involved	<p>Quadruple helix partners: local government, public institutions, the private sector, academia, schools/universities, and civil society.</p> <p>Sofia Municipality, Sofia Municipal Council and the 24 districts of Sofia Municipality.</p>
Relevance to RRI keys (Research ethics, Public engagement, Science education, Gender equality, and Open access)	<p>Public engagement: SofiaLab is open to audiences from schools and educational institutions, civil society organisations, research and academia, technology and business sectors on the territory of the city.</p> <p>Open access: premises are open to the public, in compliance with the rules of operation of the Lab.</p>

³² Founded in November 2006, the ENoLL network is constantly growing and has over 150 active members – living laboratories worldwide, including active members in 20 of the 28 EU Member States.



	<p>Science education: most activities organised by SofiaLab or in partnership with other organisations (hackathons, game nights, competitions) support science education, digital skills development, innovative learning projects.</p> <p>Gender equality: the gender equality policy of SDA applies also to SofiaLab.</p>
Relevance to AIRR dimensions (Anticipation, Inclusiveness, Reflexivity and Responsiveness)	Activities organised by SofiaLab largely support the annual working programme of Sofia Development Association and Sofia Municipality. In this respect, all four aspects of AIRR are relevant to its operation. SofiaLab reports annually to Sofia Municipality (through the annual reports submitted to the municipal council by SDA).
Status of the practice	Since 2018 – to date.
Benefits of implementing the RRI practice	SofiaLab provides support to SDA and Sofia Municipality for the implementation of key priorities set in many strategic programmes and initiatives for sustainable urban development through 1) multi-actor, multi-stakeholder collaboration; 2) providing a space for sandboxing and incubation of various research and innovation actions, including at policy level; 3) facilitating partnerships with local city authorities, civil society, research/academia, and the private sector at local/national/EU level.
Compatibility with the planned transformative outlook	The activities support the implementation of the Innovation Strategy for Smart Specialisation of Sofia, ³³ Sofia Youth Strategy 2017-2027 and the Strategy for Digital Transformation of Sofia ³⁴ (adopted in 2020). All activities and projects are based on a multi-sectoral, interdisciplinary and inclusive approach. SofiaLab, with the support of Sofia Development Association, the municipal administration and civil society organisations, supports the innovation eco-system in many areas such as digital skills, digital transformation, circular economy, social entrepreneurship, etc. SofiaLab has the capacity to act as a platform for the exchange of best practices, training and support of policy and strategic visions with regard to territorial governance and development based on RRI. Thus, it contributes to the development of communities of innovation, knowledge and practice which can help transform Sofia into a smart, innovative city.
Further information (link to websites, reports, press coverage)	https://sofia-da.eu/en/ https://www.facebook.com/sofiababsda

³³ https://www.sofia.bg/documents/20182/448750/ISIS_Sofia.pdf/f51fcd5a-2973-4679-89fe-62b3dccb6662 (in Bulgarian)

³⁴ <https://innovativesofia.bg/en/strategies-and-policies/>



Good Practice: Expert Council on “Science, Technology and Innovation” supporting the Mayor’s Office in Sofia

Owner of the practice / responsible organisation or institution: Sofia Municipality

About the practice	In 2012, an Expert Council on Science, Technology and Innovation was established to support the office of the Mayor of Sofia Municipality. The council comprises representatives of universities and the Bulgarian Academy of Sciences, representatives of technological and innovation companies, the Ministry of Education and Science, and civil society organisations.
Policy area of the practice	Support for innovation, digital transition and new skills, youth employment and entrepreneurship, sustainable urban development.
Main objective of the practice	The Council supports the activities of Sofia Municipality by providing expert opinions on various urban development projects as well as for the creation of long-term visions for the city. The Council members participate in several thematic working groups in the areas of ecology, public transport, cultural and historical heritage, education and entrepreneurship. The Expert Council is based on the success of past collaborations between the municipal administration and academia: in the field of transport, the municipality is working with the Institute of Space Technology, the Bulgarian Academy of Sciences, Sofia University, the National Institute of Meteorology and Hydrology, the University of Architecture, Civil Engineering and Geodesy; in the areas of education and culture – the Cluster for Innovation and Culture, Sofia City of Knowledge, etc.
Geographical scope of the practice	Sofia Municipality
Stakeholders involved	Academia, research institutes, business, civil society
Relevance to RRI keys (Research ethics, Public engagement, Science education, Gender equality, and Open access)	The Expert Council is an example of engaging key stakeholders from the research and innovation eco-system in the development and implementation of strategic plans for urban development. This is also a good example of understanding [political and policy] responsibility in RRI, and the territorial dimension of RRI in particular. This is the only municipal council of this kind in Bulgaria and it is a good practice, recognised also by the EU Parliament.
Relevance to AIRR dimensions (Anticipation, Inclusiveness, Reflexivity and Responsiveness)	The Expert Council working groups support the efforts of the municipality to develop evidence-based and forward-looking policies, effectively employing all of the principles of AIRR.
Status of the practice	Since 2012 – to date
Benefits of implementing the RRI practice	Through the Expert Council the Mayor’s office has the support of a multi-disciplinary body, which ensures that the voices of academia and



	civil society are considered in developing and implementing policies in science and technology.
Compatibility with the planned transformative outlook ³⁵	The Council was instrumental in developing the first smart specialisation strategy (RIS3) for Sofia in 2015. The Council members will be invited to contribute to the transformative territorial outlook for Sofia as well.
Further information (link to websites, reports, press coverage)	https://www.sofia.bg/documents/20182/6643563/SO15-9300-369-21122015_Strategiya.pdf/f7a86a04-b106-4584-9890-cc7b5b2e8b42

Good Practice: Sofiaplan – Vision for Sofia 2050	
Owner of the practice / responsible organisation or institution: Sofiaplan / Sofia Municipality	
About the practice	<p>Sofiaplan is a municipal enterprise responsible for the spatial and strategic planning of Sofia Municipality. The unit has a multidisciplinary team of nearly 30 experts who work in active dialogue with various stakeholders, collect and analyse data on various aspects of urban environment and municipal development, and make policy proposals to Sofia's Municipal Council, the Mayor, District Mayors and Deputy Mayors.</p> <p>One of the key projects of Sofiaplan, described herein as a good practice, is the Vision for Sofia – a long-term strategy for the development of Sofia Municipality until 2050. During its preparation, many stakeholders were engaged through public discussions, surveys, interviews, etc. This approach has been recognised as a good practice by the Association of Bulgarian Municipalities and was recommended to other municipalities.</p>
Policy area of the practice	Sustainable urban development (sections of the Vision also relate to digital transition and support for innovation).
Main objective of the practice	Vision for Sofia is an initiative of Sofia Municipality, aimed at creating a shared long-term strategy for the development of Sofia and suburban areas until 2050. The project proposes concrete steps, measures and objectives for the future of the city. The main thematic areas of the Vision include Urban Environment, Transport, Environment, Economy, Management, Identity, Culture and People.

³⁵ The transformative outlook is one of the main documents to be developed by the RRI project: the document will represent a future-oriented strategy and action plan centred on the specific policy area/s, chosen by each of the four territorial partners in the project. Four such outlooks will be elaborated (one per territorial partner).

Geographical scope of the practice	Local – Sofia Municipality and metropolitan area
Stakeholders involved	<p>Sofia Municipality, district administrations, civil society organisations, universities, research institutes.</p> <p>Representatives of various political parties, non-governmental organisations, businesses, entrepreneurs, researchers and citizens took part in the debates. Expert panels were involved in the discussions of the individual document sections. Good practices and examples from other cities and similar initiatives were considered (e.g., from Boston, Vienna, Tel Aviv, Barcelona, Copenhagen).</p>
Relevance to RRI keys (Research ethics, Public engagement, Science education, Gender equality, and Open access)	<p>Applicable RRI keys: research ethics, public engagement, gender equality, open access.</p> <p>The process of developing the Vision went through several steps, which engaged various stakeholders and citizens.</p> <p>Step 1 – Organisation of the process. Seven teams of experts, selected through a public procurement procedure, were formed to work on the Vision.</p> <p>Step 2 – Gathering information. Over 400 interdisciplinary meetings were held.</p> <p>Step 3 – Research and activation. Meetings with stakeholders – NGOs, politicians, administration, entrepreneurs, researchers and others, were organised. An information and awareness-raising campaign with posters and outdoor advertising was carried out; online and offline surveys were conducted; four public discussions „Dialogues for Sofia“ were held.</p> <p>Step 4 – Formulating the goals. Through a series of multidisciplinary workshops, each expert team discussed the main objectives for each thematic area. As a result, a list of 69 goals and 490 measures for implementation was proposed for further expert and public consultations. These included discussions in the Sofia Municipal Council and the municipal administration, followed by 20 thematic expert meetings, attended by a total of 178 participants (50 from the administration, 52 from NGOs, 40 from business, 33 independent experts and 3 branch organisations). Parallel meetings were held with representatives of the neighbouring satellite municipalities around Sofia – mayors and municipal councillors.</p> <p>Step 5 – Activation. Activities comprised a series of public presentations, discussions and ranking of the proposals for the goals and measures of the Vision.</p> <p>Step 6 – Formulation of Vision for Sofia. All information, data, proposals, feedback was discussed and systematised. A representative</p>

	<p>sociological survey was conducted, polling citizens attitudes towards the proposed vision.</p> <p>A public Forum „Sofia: 2050“ with a live broadcast on Facebook took place at the end of 2019 in order to present the document. The final presentation of the Vision was organised in December 2019, during an open exhibition „Sofia Tomorrow“ in the centre of the city.</p>
Relevance to AIRR dimensions (Anticipation, Inclusiveness, Reflexivity and Responsiveness)	As evidenced by the description of the planning and implementation steps above, all of the AIRR dimensions have been applied in the process.
Status of the practice	The first public discussions for Vision for Sofia were organised in 2017. In December 2019 the final report was submitted to the Chief Architect of Sofia Municipality. The Municipal Council held a plenary session for the discussion of the document in June 2020.
Benefits of implementing the RRI practice	Vision for Sofia 2050 sets the long-term goals for the development and transformation of Sofia into a smart and sustainable metropolitan city. The process of the Vision's preparation is an example of systematically applying the principles of RRI in territorial governance, based on a multi-actor, multi-stakeholder engagement plan. A significant part of the data has been digitised and organised into reproducible maps, graphs and a comprehensive library of reports, which will serve as a baseline for monitoring the progress of the Vision's implementation in the future. The Vision formulated 24 long-term goals, nearly 250 steps and 385 specific measures, which are to be translated into an action plan for the local administration. This way the Vision sets the foundation for and will encourage changes in the operations and management of the local government, based on anticipatory, responsive, reflexive, and inclusive governance procedures.
Compatibility with the planned transformative outlook	This document sets the most important priorities for the city and the municipality's planning and development concerning infrastructure and related eco-systems until 2050. It is a key document which the transformative outlook for Sofia Municipality will be built upon.
Further information (link to websites, reports, press coverage)	https://sofiaplan.bg/projects/ https://vizia.sofia.bg/vision-sofia-2050/



Good Practice: Research and Industry Laboratory Industry i2030 (RILAB i2030) Owner of the practice / responsible organisation or institution: Bulgarian Academy of Sciences	
About the practice	<p>The research and industry laboratory Industry i2030 (RILab i2030) was launched in May 2019 at the Bulgarian Academy of Sciences, in partnership with Sofia Municipality, Sofia Development Association and Sofia Investment Agency. It is structured in nine laboratories located at the Institute of Information and Communication Technologies (IICT – BAS) and at the Institute of Mechanics (IMech – BAS). RILab i2030 aims to integrate science, business and education in the field of digital technologies. It also offers support for joint innovation and research projects to SMEs and high-tech industries on the territory of Sofia. The Lab will help businesses to commercialise the results of research and technology transfer as well as to exploit innovative products. RILab i2030 will further provide trainings to PhD students, postgraduates, undergraduates and high school students through practical STE(A)M work and internships.</p>
Policy area of the practice	Support for innovation, digital transition and new skills, youth employment and entrepreneurship.
Main objective of the practice	<p>The Lab's main objective is to enable the collaboration and synergies between key actors in science, research, education and industries in the field of digital technologies. The Lab will support experimental research, joint research and innovation projects between BAS researchers, other local/national research institutes and SMEs.</p>
Geographical scope of the practice	Local/national
Stakeholders involved	<p>Bulgarian Academy of Sciences, Sofia Municipality.</p> <p>Members of the laboratory and the consortium linked to its development also include FESTO, David Holding, AMG Technology, NanoTech Lab, and SofiaLab. The companies will provide licensed software products for process simulation as well as equipment for scientific research.</p>
Relevance to RRI keys (Research ethics, Public engagement, Science education, Gender equality, and Open access)	Research ethics, science education, open access, public engagement.
Relevance to AIRR dimensions (Anticipation, Inclusiveness, Reflexivity and Responsiveness)	All principles are applicable.
Status of the practice	Since 2019 - present

