



EUROPEAN COMMISSION

Brussels, 4.4.2011
COM(2011) 152 final

**COMMUNICATION FROM THE COMMISSION TO THE COUNCIL, THE
EUROPEAN PARLIAMENT, THE EUROPEAN ECONOMIC AND SOCIAL
COMMITTEE AND THE COMMITTEE OF THE REGIONS**

**TOWARDS A SPACE STRATEGY FOR THE EUROPEAN UNION THAT
BENEFITS ITS CITIZENS**

SEC(2011) 381 final
SEC(2011) 380 final

**COMMUNICATION FROM THE COMMISSION TO THE COUNCIL, THE
EUROPEAN PARLIAMENT, THE EUROPEAN ECONOMIC AND SOCIAL
COMMITTEE AND THE COMMITTEE OF THE REGIONS**

**TOWARDS A SPACE STRATEGY FOR THE EUROPEAN UNION THAT
BENEFITS ITS CITIZENS**

**1. SPACE POLICY: A RESPONSE TO THE SOCIAL, ECONOMIC AND STRATEGIC
CHALLENGES THAT WE FACE**

Space activities and applications are vital to our society's growth and development. They often have a direct impact on citizens' daily lives. In this context, space policy is an instrument serving the Union's internal and external policies and responds to three types of need:

- social: the citizens' well-being depends on space policy in areas such as the environment, combating climate change, public and civil security, humanitarian and development aid, transport and the information society;
- economic: space generates knowledge, new products and new forms of industrial cooperation, it is therefore a driving force for innovation and contributes to competitiveness, growth and job creation; and
- strategic: space serves to cement the EU's position as a major player on the international stage and contributes to the Union's economic and political independence.

In this regard, the space sector directly contributes to achieving the objectives of the Europe 2020 Strategy,¹ namely smart, sustainable and inclusive growth. Space policy thus forms an integral part of the "Industrial Policy" flagship initiative and the Strategy calls on the Commission to strive "to develop an effective space policy to provide the tools to address some of the key global challenges and in particular to deliver Galileo and GMES". In October 2010, the Commission thus adopted the "Communication on Industrial Policy"², in which the Commission proposes "measures in 2011 to implement the priorities of the space policy based on Article 189 of the TFEU [and will pursue] a Space Industrial policy developed in close collaboration with the European Space Agency and Member States". In its conclusions of December 2010, the Competitiveness Council concurred and underlined "in particular the role of the space sector in EU competitiveness and innovation." It noted "the Commission's intention to propose the necessary space policy measures and to pursue a space industrial policy."

¹ "EUROPE 2020 A strategy for smart, sustainable and inclusive growth" COM(2010) 2020.

² "An Integrated Industrial Policy for the Globalisation Era – Putting Competitiveness and Sustainability at Centre Stage" COM(2010) 614

Europe boasts a rich heritage in space, with the achievements and expertise accumulated by the Member States and by the European Space Agency (ESA)³. The gradual emergence of EU competence with regard to space builds on that heritage.

Cooperation with the ESA culminated in the adoption, in 2004, of a framework agreement, which, inter alia, provided for the creation of the Space Council, the concomitant meeting of the Council of the EU (Competitiveness) and the Ministerial Council of the ESA. The European Geostationary Navigation Overlay Service (EGNOS) and Galileo satellite navigation programmes and the Global Monitoring for Environment and Security (GMES) system are results of the Union's interest in space. Since then, seven Space Council meetings have provided guidance for Europe's space initiatives. At its fourth meeting in May 2007, the Space Council welcomed the efforts made jointly by the European Commission and the ESA to implement initiatives geared towards users and those aimed at strengthening the development and operation of integrated space applications⁴.

For its part, the European Parliament has always pushed for an ambitious European Space Policy⁵. In common with the other major space powers, it therefore appears that in Europe space is acknowledged at a high political level by all of the actors involved as an important factor in helping to meet the needs of citizens.

Article 189 of the TFEU, conferring on the Union a shared space competence which it pursues alongside that of the Member States, needs to be seen in this context. The Union thus has a specific mandate to draw up a European space policy, and, "to this end, it may promote joint initiatives, support research and technological development and coordinate the efforts needed for the exploration and exploitation of space". To this end, "...Parliament and the Council shall establish the necessary measures, which may take the form of a European space programme".

In this new framework, Europe's space policy is aimed at achieving the following objectives: promoting technological and scientific progress, stimulating industrial innovation and competitiveness, enabling European citizens to reap the benefits of space applications and raising Europe's profile on the international stage in the area of space. In order to achieve those goals, Europe needs to keep independent access to space. The following section sets out the priority actions designed to put those objectives into practice.

2. PRIORITY ACTIONS FOR A EUROPEAN UNION SPACE POLICY

The first priorities for this policy set out at the fourth Space Council meeting are the flagship Galileo and GMES projects. The fifth Space Council meeting approved those projects and identified further priorities. Climate change, security, competitiveness and space exploration have ever since been reaffirmed as priority areas where specific action continues to be required.

³ The text uses the English acronym ESA. The ESA comprises 18 countries, two of which – Norway and Switzerland – are not EU Member States. Canada, Hungary, Poland and Romania take part in some cooperation projects with the ESA.

⁴ Outcome of the Competitiveness Council meeting of 21 and 22 May 2007, Resolution on European Space Policy, DS 417-07.

⁵ European Parliament Resolution of November 2008, whereby Parliament approves the European Space Policy and urges that definite action be taken on the four proposed priorities – climate change, security, innovation and exploration.

2.1. Satellite navigation: the Galileo and EGNOS programmes

Galileo is one of the Union's flagship programmes and the first satellite navigation system in the world designed for civilian use. It will enable the Union to remain independent in a strategically important field, at a time when reliance on global navigation systems continues to grow. EGNOS was the first European satellite navigation measure, and its goal is to improve the quality of the signals transmitted to European territory by global satellite navigation systems. The systems that emerged from the Galileo and EGNOS programmes represent the first major space facilities solely belonging to, and managed by, the EU.

These two programmes form an integral part of the Europe 2020 strategy, as they are intended to push the EU to the forefront by developing innovative ways of exploiting satellite navigation, boosting economic activity in the market further downstream, creating new business opportunities, facilitating the provision of humanitarian aid and enhancing the well-being of Europe's citizens (by making transport safer, increasing civil protection and developing social services for the elderly and the disabled, to give but a few examples). The benefits of these programmes for the EU cut across all sectors of the economy, such as transport, telecommunications, the environment and security.

In January 2011, the Commission adopted the Mid-term review of the European satellite radio navigation programmes, where it is stated that the GNSS applications markets are growing rapidly, and that their annual turnover worldwide is expected to reach around €240 billion by 2020. Moreover, as a result of the advantages of Galileo and EGNOS compared with the other competing systems, they are expected to generate economic and social benefits worth around €60-90 billion over the next 20 years.

Later in the year, the Commission will draft a proposal for legislation aimed at adapting the institutional framework that covers the Galileo and EGNOS programmes to take account of the guidelines put forward by the European Parliament and the Council. It is important to ensure that the satellite constellation required to pursue these programmes is put in place within a reasonable amount of time and that all of the provisions required for the gradual deployment of Galileo services are implemented.

2.2. Using Space for the Benefit of the Environment and to Aid the Fight against Climate Change: the GMES Programme

2.2.1. The Implementation of GMES

The purpose of the GMES programme is to guarantee continuous access to information services on the environment and security issues which are based on permanent space-based observation and in-situ infrastructures. The GMES programme plays a vital role in monitoring the sea, land and atmospheric environment, aiming to facilitate better understanding of the European and global environments as a basis for policy. It will help underpin a sustainable use of resources as well as providing better information on climate change.

It may thus be used to support policies on climate change adaptation and security, and to contribute to crisis prevention and management, with particular emphasis on humanitarian aid, development assistance and civil protection.

Beyond improving the provision of services, both to public policy-makers and to citizens, GMES has the potential to create opportunities for increased private-sector usage of information sources.

A Regulation governing the initial operations of the GMES programme 2011-2013 was adopted in 2010 by the European Parliament and the Council⁶. The GMES programme now has a legal basis that makes it more than a research activity. The current priority is to ensure that it is implemented quickly and effectively, in partnership with the Member States, and that it is fully operational by 2014.

2.2.2. *Climate Change as a Challenge Facing Society*

The GMES programme is a powerful tool at the Union's disposal in the fight against climate change. Space observation, along with observation from other sources, provides us with information to improve our understanding of how the climate is evolving and enables us to draw up policy to adapt to that development.

The EU and its Member States could benefit from the permanent, systematic availability of additional information that could prove useful when adapting numerous public policies, with a view, in particular, to improving the effectiveness of measures taken to prevent, or respond to, climate change. The EU would also be in a stronger position if it had reliable, independent sources of information to ensure that international commitments in the fight against climate change are being met. This monitoring capacity at EU level yields further benefits, as it can complement or replace resources that have until now been at national or regional level.

To this end, it is necessary to build on existing space monitoring infrastructure and to ensure the continuity of the infrastructure needed in order to implement and pursue policies to combat and adapt to climate change; the overall aim is to strengthen the 'climate change' component of the GMES programme. As manager and user of the GMES programme, the EU must define and facilitate the development of this European service and the necessary infrastructure.

2.3. **Secure Space to Achieve Security and Defence Objectives**

As regards security, space infrastructure acts as both an instrument and an asset. As an instrument it can serve the European Union's security and defence interests; as an asset it requires protection.

2.3.1. *The S (Security) component of the GMES programme*

The seventh meeting of the Space Council in November 2010 recommended that "within the GMES programme, additional consideration should be given on how to meet the specific needs of security policies and the services dedicated notably to maritime surveillance, border control and support for EU external actions".

The S (Security) component of the GMES programme must therefore be enhanced. Discussions are taking place to analyse how new developments affecting space technologies can contribute to effective solutions for areas such as monitoring borders, support for the European Union's external action, maritime surveillance, complex emergencies, humanitarian aid and civil protection.

⁶ Council Regulation (EEC) No 911/2010 of the European Parliament and of the Council of 22 September 2010, OJ L 276, p.1, 20 October 2010

Although GMES is a programme solely for civilian use, it is important to identify how existing dual-use observation resources – i.e. both civilian and military – can contribute to the GMES programme, for example, for the systematic surveillance of large geographical areas or the tactical surveillance of smaller areas. Different space technologies with sufficient resolution must be deployed and response times must be improved if the requirements of security missions are to be met.

2.3.2. *The Security Dimension of Space Policy*

The seventh meeting of the Space Council acknowledged "the reinforced EU engagement in security and defence matters embedded in the Lisbon Treaty and the setting-up of the European External Action Service". It invited the European Commission, the EU Council, assisted by the European Defence Agency (EDA), together with Member States and the ESA "to explore ways to support current and future capability needs for crisis management through cost-effective access to robust, secure and reactive space assets and services [...] taking full advantage of dual-use synergies as appropriate." It also invited "the European Commission and the EU Council to propose policy solutions where necessary".

The Member States have valuable capabilities, and have acknowledged the European dimension of space for security and defence by launching the MUSIS (Multinational Space-Based Imaging System for Surveillance, Reconnaissance and Observation) project. In the spirit of the Common Security and Defence Policy, the EU's security needs may be met either by deploying national resources in a coordinated manner or by implementing shared resources.

In order to strengthen its security missions without depending on the facilities and services of non-Member States and to ensure the continuity of missions developed by the Member States, the EU must begin discussions with the Member States to look into the possible options. In the framework of the Common Security and Defence Policy, the EU could, for example, coordinate national facilities under conditions to be agreed with the owner Member States and identify additional needs in order to fulfil more effectively operational needs in the areas of crisis management and external action. To meet those needs, the EU could take part in the development of new infrastructure. The appropriateness of using commercial facilities for security missions must also form part of these discussions.

This approach must take account of related policies – such as maritime security and surveillance – pursued by the Union and the Member States.

2.3.3. *Making Space Infrastructure Secure*

Space infrastructure is critical infrastructure on which services that are essential to the smooth running of our societies and economies and to our citizens' security depend. It must be protected and that protection is a major issue for the EU that goes far beyond the individual interests of the satellite owners.

Such infrastructure is at risk of damage or destruction by natural phenomena, such as solar radiation and asteroids, and by other spacecraft and their debris. It is also under threat from electromagnetic interference, be it intentional or otherwise.

Some Member States have the resources to respond in part to these risks. However, these resources are inadequate because of their technical shortcomings and the absence of sufficient coordination mechanisms. Consequently, in order to ensure the protection of its space

infrastructure, the EU is largely dependent on the resources and the good will of non-Member States.

In 2008, the fifth Space Council meeting confirmed that Europe must "develop a European capability for the monitoring and surveillance of its space infrastructure and of space debris". It also confirmed that the Union needs to play an active role in the implementation of the Space Situational Awareness (SSA) system and its governance mechanisms.

Implementing this system involves gathering existing resources, making good any shortfalls and maintaining and operating the system. The Industrial Policy Communication states that "the Union should define the organisation and governance of such a system taking into account its dual nature and the need to ensure its sustainable exploitation." The SSA system should be organised according to a structure, yet to be defined, that would take account of the level and extent of participation of each Member State and of the other bodies involved, depending on the missions to be accomplished and constraints to be respected.

2.4. Space Exploration

In 2008, the Space Council's resolution highlighted "the need for Europe to develop a common vision and long-term strategic planning for exploration, ensuring key positions for Europe, therefore based on its domains of excellence". Active involvement by the EU in this area would enable it to establish a closer link between space exploration and social and economic challenges by merging the interests of the different Member States and ensuring that internal resources are used effectively. There is a political dimension to space exploration that goes beyond the issues inherent in research and development.

Europe is a partner that is known for its competence and reliability in this sector, but it is not making the most of its potential because its actions are too piecemeal and because of the lack of linkage between space exploration and the political, economic and social challenges that we face.

Following consultation between the Union, the ESA, the Member States concerned and the international partners, four priorities have been identified: critical technologies, the International Space Station (ISS), access to space and setting up a high-level international forum.

Specifically, the Union seeks to identify and support the development of essential technologies for exploration, in particular in the fields of energy, health and recycling (support for life in isolated environments). These matters are not necessarily dealt with in the space sector itself and cross-fertilisation should be promoted with other sectors in order to benefit the citizens directly.

The Union could also explore options to work with the ISS, ensuring that all Member States participate in it.

The EU's independent access to space also means increased European capability to pursue independent missions from Europe's spaceport in Kourou.

Lastly, a high-level international platform should be set up in order to identify the areas of space exploration open to international cooperation, to strengthen the political dimension of international discussions on space exploration and to enhance cooperation synergies with non-Member States; in short, a platform enabling the EU to coordinate the European space effort.

3. COMPETITIVENESS: SPACE AS AN INTEGRAL PART OF THE EUROPE 2020 STRATEGY.

3.1. Space Industry Policy for the Benefit of Competitiveness

Under Article 189 of the TFEU, the Union "shall draw up a European space policy" with a view to promoting, *inter alia*, industrial competitiveness. The space industry – manufacture, launching and operating, applications and services – is a driving force for growth and innovation, generating highly qualified jobs and market opportunities for innovative products and services far beyond the space sector.

The space industry is a key sector given society's increasing dependence on space infrastructure and applications for both civilian and military use. In the space industry, there is a high degree of concentration but few SMEs. In Europe, in common with other space powers, the space sector is highly reliant on public procurement, and has to contend with increased competition on the world market.

Satellite communications (SATCOM) form a significant part of this market: orders for such equipment provide regular work for the launch sector, thereby contributing to the objective of independent access to space for the European Union and its Member States, who depend on affordable launching capacities for their programmes. The Commission believes that it is vital to quickly draw up, in close cooperation with the ESA and the Member States, a space industry policy that fully reflects the specific needs of each sub-sector. The main objectives of such a policy would be the steady, balanced development of the industrial base as a whole, including SMEs, greater competitiveness on the world stage, non-dependence for strategic sub-sectors such as launching, which require special attention, and the development of the market for space products and services.

To this end, the European Union, the Member States and the ESA must use the mechanisms available to them in a coordinated manner.

As regards the Union's space programmes it is necessary to make better use of the European regulatory framework, regarding trade in particular, and of the financial instruments to support research and innovation and to define the most appropriate type of procurement procedures and the applicable award procedures when EU funding is concerned. The option of adopting specific provisions under particular legislative acts could be examined.

3.2. Boosting Research and Innovation

Europe needs a solid technological base if it is to have an independent, competitive space industry. It must also develop the necessary resources to meet long-term needs while maintaining basic space research. In this regard, it is vital to develop key generic technologies such as advanced materials and nanotechnology.

The purpose of investment must be to increase the excellence of European research. In order to rectify current shortcomings, it is necessary to support research into critical technologies (i.e. those that are essential for the sector's strategic non-dependence) and breakthrough technologies (i.e. those that constitute genuine technological advances), including research supporting space exploration. The Community research efforts contributing to these challenges will be set out in the proposal for the Common Strategic Framework for Research and Innovation funding.

Most of the expected benefits of space investment, for the sector itself and beyond, relate to its effect on innovation. Space policy can make a decisive contribution to making the 'Innovation Union' a reality. The sixth Space Council meeting of May 2009 emphasised "the need to mobilise existing innovation support mechanisms at European, national and regional level, and consider new support instruments". Mobilising these mechanisms will make it possible to improve developing infrastructure by boosting the market for applications and services derived from the Galileo/EGNOS and GMES programmes, as well as for the telecommunications sector. In turn, the setting of ambitious space objectives will stimulate innovation.

3.3. Telecommunications Satellites Fostering Innovation

Communications satellites constitute a key space sector, generating the largest revenues in the space industry, in both Europe and the rest of the world⁷.

Communications satellites offer greater access to a broad range of economic and social services such as high-speed Internet, television and radio and improved transport facilities. They also facilitate the development of services for the citizens such as public safety and emergency-response, health and home-based services. Accordingly, communications satellites have a clear role to play in delivering on the Digital Agenda for Europe objective of bringing basic broadband to all Europeans by 2013 and they also have the potential to contribute to the objective for all Europeans to have access to an Internet speed of 30 Mbps by 2020. In particular for the most remote and/or rural regions of Europe, communication satellites can bring broadband connections. These developments will parallel the implementation of the GMES and Galileo programmes.

Advanced technologies developed for communication satellites can also be integrated into navigation and earth observation applications. In particular, the re-use of public sector information (PSI) has proven instrumental in fostering a number of new services to the citizens directly. In the area of security, for instance, the Europe-wide eCall system of automatic emergency calls in vehicles relies on precise location and will therefore help reduce the number of deaths and the damage and personal injuries suffered by citizens in road accidents. In order to maintain Europe's lead in satellite communication technologies, research must be carried out at European level, given the spin-offs it can create for other application sectors. Lastly, the availability of the appropriate radio spectrum will be necessary to ensure that satellite communications and space infrastructure are operational and help achieve the European Digital Agenda and EU space policy objectives. It is crucial to take this into account in pursuing existing programmes and in defining new European space initiatives.

4. THE INTERNATIONAL DIMENSION OF THE EU'S SPACE POLICY

International cooperation is vital when it comes to space. Increasingly, space endeavours are no longer a matter for individual nations alone and in many cases can only be efficiently achieved by pooling technological and financial capacities. International cooperation should also serve as a market opener for the promotion of European technology and services in the space field and so help strengthen this strategic industrial sector. International cooperation in space should also support the promotion of European values through space-based projects focused on environmental protection, climate change, sustainable development and

⁷ Telecommunications satellites account for over 60% of the space industry's turnover. 90% of satellites launched by Ariane 4 and 5 are communications satellites.

humanitarian action. The EU, in close collaboration with the ESA, will continue to maintain and strengthen its "space dialogues" with its strategic partners – i.e. the United States and Russia – with a view to increasing cooperation. These dialogues seek to identify areas where there is mutual benefit in cooperation; they cover a broad range of activities including Earth observation and Earth science, Global Navigation Satellite Systems, Space Science and space exploration. The EU will also propose that space dialogues, the scope and objectives of which will be set out in appropriate bilateral arrangements, be established with other existing and emerging space powers, in particular the People's Republic of China; the EU will seek constructive solutions to issues of cooperation and sharing open frequencies in the field of satellite navigation.

The EU must ensure that space-related matters are better integrated into the Union's external policy. The EU would, in particular, like to ensure that its expertise and infrastructure benefit Africa and to step up ongoing cooperation. Earth observation data or data obtained by satellite systems are essential for Africa, in particular for transport safety, cartography, the management of water and rivers, food resources and raw materials, biodiversity, soil use, deforestation and combating desertification. There is already active cooperation regarding space applications as part of the Africa-EU partnership on Science, Information Society and Space. In the seventh Space Council meeting, the Council insisted "that the decisions to implement the related priorities of the GMES and Africa action plan be taken without delay". It invited "the European Commission to work with the African Union Commission towards capacity building in this area [...] and to determine the way a similar infrastructure to EGNOS could be implemented in Africa". As regards EGNOS, the November 2010 Europe-Africa summit approved an action plan aimed at, in particular, the secondment of staff to the entity managing the African GNSS programme, the training of African experts and the development of initial infrastructure and start-up operations.

The European Union will continue to support efforts of the international community to strengthen the security, safety and sustainability of activities in outer space, in particular through the EU proposal for a Code of Conduct for Outer Space activities.

The EU's competence in the area of space will help strengthen its role in multilateral forums. As regards earth observation, Europe is closely involved in developing the Global Earth Observation System of Systems (GEOSS) international initiative. The Commission will therefore continue to make the necessary efforts to implement mechanisms for sharing earth observation data in Europe, subject to the acceptance of such mechanisms by GEOSS members.

5. TOWARDS A WELL-STRUCTURED GOVERNANCE

The EU's increasing involvement in Europe's space policy goes hand in hand with increased interaction between the different protagonists in this area. The Union should therefore strengthen its cooperation with the Member States, examine its relations with the ESA and ensure the best possible programme management.

5.1. Strengthening the Cooperation with the Member States

The shared space competence conferred upon the EU by the TFEU goes hand in hand with a reinforced partnership with Member States in the form of policy dialogue and coordination. This is all the more necessary given that the EU competence does not prevent Member States from exercising their own.

Member States vary in the extent of their involvement, their budget and their technical capacities. In most of them, space activities are considered primarily as research activities. Even where efforts have been made to ensure complementarity and synergy, they have had limited effect.

The EU needs to strengthen the political dimension of space. Under Article 189 of the Treaty, the Union has the mandate and the capacity to coordinate the Member States' actions and to make this complementarity more effective. For this to happen, the cooperation between the Union and its Member States must be strengthened. All new actions must also be based on existing resources and on identifying jointly where new resources are needed.

Recent institutional developments are the first tangible expression of that strengthened cooperation, which should foster consistency of political objectives, whilst ensuring compliance with the respective competences of the Union and its Member States. This cooperation will reinforce the synergy of the Union's space policy with other policies that use the EU's or the Member States' space resources, such as transport, environment, research and innovation.

5.2. Developing Relations between the EU and the ESA

Under Article 189 of the TFEU "the Union shall establish any appropriate relations with the European Space Agency". The EU's increasing involvement in space entails re-assessing its relations with the ESA and gradually adapting the ESA's operations so that maximum benefit can be derived from the two organisations.

The political dimension in space-related matters means that Europe's involvement must not be geared solely or mainly towards technical or scientific aspects. For its part, the EU should gather and identify the users' needs in order to ensure that space resources meet European citizens' needs in full. The Commission helps to achieve that aim by meeting the different actors on a regular basis.

Operating bodies have been set up in different areas such as operational meteorology (namely EUMETSAT, which originally stems from the ESA) with a view to serving the users more effectively. The Commission must step up contact with these bodies and could, in part, make use of them to implement the Galileo and GMES programmes.

For its part, the ESA, which implements programmes for its Member States and for the EU, has strong technical and management infrastructure and could support the development of new space facilities as regards both intergovernmental and EU-funded programmes.

Discussions are ongoing in the ESA regarding its future as an organisation. Without prejudging the outcome of those discussions, the European Commission takes the view that developing the roles of the various actors in space in Europe should also involve the pragmatic development of the ESA, taking account of the respective roles of the ESA and the EU in terms of research, funding and operating capabilities.

As far as the Commission is concerned, the ESA should continue to develop into an organisation with an intergovernmental and an EU dimension in which military and civil programmes can coexist. As regards the implementation of the Galileo and GMES programmes, the ESA is already subject to the EU's rules. It will pursue closer ties with the EU and, according to need, will continue to have management structures geared solely towards EU programmes.

The model should be flexible enough to adapt to the level of funding that the various protagonists set aside for the different programmes in the future. A flexible membership structure should also be established in order to enable Switzerland and Norway to take part in some programmes and to offer limited participation to some Member States.

These developments mean that in due course the framework agreement between the EU and the ESA will need to be reviewed. In any case, account should be taken of their impact on the applicable legal framework, in view of the EU's international commitments.

5.3. Better Coordination and Management of Space Programmes

Space programme management remains fragmented and international investment segregated. The proliferation of protagonists – the Member States via the space agencies, the ESA, EUMETSAT and the EU – is not conducive to effective decision-making or implementation.

The Commission wishes to propose better space programming by enhancing the coordination of the programme committees (such as the Galileo and GMES programmes) and, more generally, better coordination of the different protagonists' actions in order to meet the users' and citizens' needs more consistently and ensure sound and efficient management of public resources.

6. TOWARDS A EUROPEAN SPACE PROGRAMME

Article 189 of the Lisbon Treaty gives the Union a broader legal framework that enables it to define a distinct and complementary European space programme of more sector-based actions based on other articles in the Treaty or other legal acts.

The Commission is looking into the possibility of presenting a proposal for such a programme in 2011. Taking responses to this communication into account, it will decide on its approach as part of its June proposal on the next multi-annual financial framework.

7. CONCLUSION

Article 189 of the TFEU opened up new perspectives for developing an EU space strategy. To this end, the Commission has set out practical options in this communication. The Commission thus submits it for the opinion of the Council, the European Parliament and the Union's consultative bodies, which is a necessary stage in the formation of such a strategy and of the measures to be taken for that strategy to be implemented.