# Resolutions Adopted at the ESA Council Meeting at Ministerial Level

First row, left to right: José Montilla Aguilera, Minister for Industry, Tourism and Trade (E), Laurens Jan Brinkhorst, Minister for Economic Affairs (NL), Jean-Jacques Dordain, Director General of the European Space Agency, Michael Glos, Federal Minister for Economics and Technologies (D), Maria J. A. van der Hoeven, Minister for Education, Culture and Science (NL), José Mariano Gago, Minister for Science, Technology and Higher Education (PT), Lord Sainsbury of Turville, Parliamentary Under Secretary of State for Science and Innovation (UK), François Biltgen, Minister for Culture, Higher Education and Research (LUX), Guido Possa, Vice Minister for Teaching, Universities and Research (I), Sigmar Wittig, Chairman of ESA Council

Second row, left to right: Tony Killeen, Minister of State, Department of Enterprise, Trade and Employment (IRL), Virendra Jha, Acting President of the Canadian Space Agency (CDN), Kari Tilli, Director of the National Agency for Technology (SF), Charles Kleiber, Secretary of State for Education and Research (CH), Marc Verwilghen, Minister for Economy, Foreign Trade and Science Policy (B), Helge Sander, Minister for Science, Technology and Innovation (DK), François Goulard, Minister for Higher Education and Research (F)

Third row, left to right: Ioannis Tsoukalas, Secretary General for Research and Technology, Ministry of Development (GR), Thomas Östros, Minister for Industry and Trade (S), Georg Wilhelm Adamowitsch, Secretary of State, Bundesministerium für Wirtschaft und Technologie (D), Eduard Mainoni, State Secretary, Federal Ministry for Transport, Innovation & Technology (A), Frode Berge, State Secretary, Ministry of Trade and Industry (N)

As reported in the November issue of ESA Bulletin, at their meeting in Berlin on 5 and 6 December the Ministers responsible for space activities in the Agency's 17 Member States and Canada endorsed the continuation of a set of ongoing ESA programmes and agreed to undertake major new initiatives designed to give Europe a clear vision and tangible means to further strengthen its space exploration and exploitation activities. The Ministers also reaffirmed the strategic importance of Europe continuously improving its scientific, technological and industrial capabilities in the space field, to enable it to better respond to the expectations of its citizens concerning the environment, quality of life and security. A major political step was achieved with the approval of an overall European launcher policy ensuring coherence between the launcher and satellite fields.

On the programmatic side, the Ministers took decisions concerning the Agency's mandatory activities (scientific and basic) and optional programmes (Earth observation, telecommunications, satellite navigation, human spaceflight, microgravity, exploration, launchers).

The six Resolutions adopted by the Ministers were as follows:

- Resolution on the Agency's Long-Term Plan for Discovery and Competitiveness (ESA/C-M/CLXXXV/Res. 1 (Final))
- Resolution on the Level of Resources for the Agency's Mandatory Activities 2006-2010 (ESA/C-M/CLXXXV/Res. 2 (Final))
- Resolution on the Evolution of the European Launcher Sector (ESA/C-M/CLXXXV/Res. 3 (Final))
- Resolution on the CSG Extension until end-2008 (ESA/C-M/CLXXXV/Res. 4 (Final))
- Resolution on the Evolution of the Agency (ESA/C-M/CLXXXV/Res. 5 (Final)), and
- Resolution on the International Space Station Programme (ESA/C-M/CLXXXV/Res. 6 (Final)).



esa bulletin 125 - february 2006 51

# RESOLUTION ON THE AGENCY'S LONG-TERM PLAN FOR DISCOVERY AND COMPETITIVENESS

(adopted on 6 December 2005)

Council, meeting at Ministerial Level,

RECALLING the purpose of the Agency as outlined in Article II of the Convention,

HAVING REGARD to the Resolution on directions for the Agency's evolution and policy: "Space Serving European Citizens" (ESA/C-M/CLIV/Res. 1 (Final)) adopted at Ministerial Level in Edinburgh on 15 November 2001,

HAVING REGARD to the Framework Agreement between the European Space Agency and the European Community, which came into force on 28 May 2004,

HAVING REGARD to the Orientations endorsed by the Councils at Ministerial Level on the occasion of the Space Councils held on 26 November 2004 (ESA/C-M(2004)1, rev.1), 7 June 2005 (ESA/C-M(2005)1) and 28 November 2005 (ESA/C-M(2005)22),

HAVING REGARD to the Resolution on the evolution of the Agency's financial, budgetary and industrial policies (ESA/C/CLXXI/Res. 2 (Final)), adopted by Council on 17 June 2004, and the Resolution on the Financial Regulations (ESA/C/CLXXIX/Res. 7 (Final)), adopted on 21 June 2005,

HAVING REGARD to the Director General's proposal for the 2005 Council Meeting at Ministerial Level (ESA/C-M(2005)6),

# CHAPTER I EUROPEAN VISION FOR SPACE EXPLORATION AND EXPLOITATION

- 1. WELCOMES the progress made in recent years to ensure that space activities are addressed at the highest political level in Europe, in response to the requirement already expressed during the Agency's Ministerial Meeting of Council held in Edinburgh in 2001 and still confirmed, in the international context, by the increasing attention and resources dedicated to space activities both in the established, such as the United States and Russia, and in the new space powers, such as China and India;
- 2. WELCOMES the steps made to heighten European citizens' awareness of space activities and their benefits; in particular, the success of the recent European scientific missions, such as Envisat, Huygens and Mars Express, which has confirmed, that combined European skills and efforts allow Europe to succeed in the most challenging enterprises and to reach a level of excellence for discovery and innovation in the global context;
- 3. WELCOMES Greece and Luxembourg as new Member States acceding to the ESA Convention, thus enhancing the resources and capabilities of the European space sector for the benefit of European citizens;
- 4. WELCOMES the improvements made in fostering the European dimension of space related activities in Europe in particular through the cooperation between the Agency and the European Community established by the Framework Agreement referred to in the preamble;
- 5. RECOGNISES the steps made towards the development of an overall European Space Policy as reflected in the orientations elaborated by the Space Councils, as mentioned in the preamble, which provide the guidelines for Europe's strategy and priorities in space and outline the roles and responsibilities of the European Union, the Agency and their Member States and Co-operating States, and INVITES the Director General and the Member States to pursue their efforts to elaborate such an overall European Space Policy;

- 6. WELCOMES the progress made in the implementation of the GNSS initiative, including the EGNOS and Galileo programmes and RECOGNISES that this initiative represents the largest recent European effort in the space field, combining the interests of the different actors in the public sector together with those in the manufacturing and operating industries; and EMPHASISES that the Galileo initiative is a further opportunity for Europe to affirm its prominence in space activities in the international context;
- 7. WELCOMES the second generation of operational meteorological satellites developed by the Agency for Eumetsat, NOTES the increased use of space infrastructures, to mitigate disasters also in the frame of the cooperation established via the International Charter on Space and Major Disasters and WELCOMES the substantial progress achieved by the EU and the Agency in developing forerunner services for the GMES initiative, which provides the ground for a key European contribution to the ten year plans set within the Global Earth Observation System of Systems initiative;
- 8. NOTES, with appreciation, the concrete implementation of the Plans for European Cooperating States (PECS) and the increase in the volume and quality of the relationships between the Agency and international partners, the enhanced cooperation with the Russian Federation, in particular in the launchers field, with the People's Republic of China and with India within the scientific programme and EMPHASISES that the Agency has extended the technological cooperation with third countries while preserving the strategic nature of its programmes and the role of the European industry;
- 9. TAKES NOTE of the progress achieved in the Agency's managerial and technical capabilities and of the efforts made in improving its capacity to respond to the broader role requested in the frame of the above-mentioned overall European Space Policy and international cooperation; and therefore INVITES the Director General to pursue such efforts;
- 10. NOTES the steps made in combining space-related capabilities and skills within the space sector in Europe for the implementation of ESA and national programmes; ACKNOWLEDGES the need to pursue the related efforts, also through the systematic research of the optimal utilization of the Agency's and Member States' capabilities, thus avoiding useless duplications of effort, and RECALLS the role of the Agency as technological and scientific pole for those States relying primarily on its expertise;
- 11. RECOGNISES that the global scenario in the space field is rapidly evolving, with the increase of resources dedicated to homeland security and defence and of the number of major actors, which are mastering major space technologies for civil and dual-use applications at competitive conditions;
- 12. NOTES with concern the difficulties encountered in the recent years by the European industries, resulting from a significant downturn in the commercial market on which they are dependent as well as from the competition with industries working at lower production costs, while the industries of the some other space-faring nations benefit from a strong institutional captive market; TAKES NOTE of the measures taken by the European industry to improve its position, through difficult reorganisation and concentration processes which have led to a reduction of the volume and of the distribution of European capabilities;
- 13. NOTES that the urgency to face the above difficulties has made necessary the increase of efforts for production activities, thus reducing the availability of the resources for the funding of research and development activities which are one of the key factors for acquiring new technologies and maintaining a competitive stance; NOTES the expectations, as expressed in the Space Councils' orientations mentioned above, that the European Union will use its full potential to lead in identifying and bringing together user needs and will identify and allocate resources for ensuring the availability and continuity of space-based operational services supporting its policies, in particular for the joint ESA-EU initiatives GNSS and GMES;
- 14 REAFFIRMS the strategic importance for Europe of continuously improving its scientific, technological and industrial capabilities in the space field, in order to increase Europe's capability to respond to the expectations of its citizens in the fields of environment, quality of life and security, supported by a European scientific community being at the leading edge of the progress of knowledge and a European industrial sector being successful on the commercial market, thus contributing to growth and employment and UNDERLINES that the current context requires urgent actions to improve the scientific and technological capabilities of Europe in order to consolidate its excellence and reinforce its ability to reap the benefits of the commercial market;
- 15. CONSIDERS that the above urgent actions require the continuous fostering of European cooperation in the space field, including all space value chain segments, by the further development of an overall European Space Policy encompassing ESA, EU, national and industrial programmes and by the allocation of the available resources and capabilities to common European initiatives, so as to reach the critical mass to face the worldwide competition and DECIDES, by taking account of the orientations of the Space

## **Cesa Ministerial Council**

Councils on the respective roles and responsibilities of the Agency and the European Union, that the Agency's Long-Term Plan be focused on discovery and competitiveness;

- 16. CONSIDERS, taking into account the extent of the resources expected for the financing of ESA programmes and activities, that it is necessary to streamline the allocation of such resources by directing the investments to fields in which:
  - a. within the overall European Space Policy, the Agency will play a leading role;
  - b. Europe has demonstrated its ability to excel;
  - c. significant user demand can be consolidated;
  - d. the technological value is high;

and thereby allowing unrestricted availability to Europe of critical technologies;

- 17. EMPHASISES therefore that priority in the short term must be given to the Agency's programmes providing the necessary scientific progress and technological steps to enhance the European competitiveness, and better serving the citizens;
- 18. ACKNOWLEDGES that given the present uncertainties related to:
  - the assembly and exploitation of the International Space Station;
  - the level and timing of the EU funding for the EU led programmes, in particular GMES;
  - the evolution of the institutional and commercial launch services demand;

part of the ESA activities relevant to the above context should be implemented within a stepped approach, and AGREES upon the Director General's proposal to plan for them a second decision step at a next Council at Ministerial Level to be organized in early 2008, as outlined in Chapter IV below;

19. WELCOMES the Director General's proposal referred to in the preamble, which provides the basis for the decisions taken on this day for implementing the first step of the Long-Term Plan provided for in Chapter II below;

#### CHAPTER II THE AGENCY'S LONG-TERM PLAN 2006-2015

- 20. WELCOMES the Director General's proposal of a Long-Term Plan 2006-2015 consistent with the orientations provided by the Space Councils and providing a strategic framework for implementing Member States' priorities, objectives and correlated financial resources for a period of ten years, thereby favouring coordination with EU and national initiatives and providing the financial frames per programme domain for approved and not yet approved programmes and initiatives; RECALLS that the Long-Term Plan does not imply by itself any financial commitment by the Member States;
- 21. AGREES that such a Long-Term Plan 2006-2015 is being developed along the following strategic guidelines and be subject to regular revisions and assessments to take into account the factors which may have an impact on its evolution:
  - Focus on science and discovery, foster innovation and transfer the relevant progress and knowledge to enhance existing and open new operational applications;
  - Consolidate European competitiveness and technological excellence in co-operation with industry and operators;
  - Promote and extend the utilisation of space-based infrastructures and services in current and new application domains;
  - Ensure the availability and maintenance of European sources and in particular the unrestricted availability to Europe of critical capabilities, components and technologies;
  - Enhance coherence in the development and growth of all European space capacities;
  - Maintain a balance in international relations, where Member States derive benefits from their investments, be it through cooperation or competition;

- 22. INVITES the Director General to implement the above mentioned guidelines through the inclusion in the Long Term Plan of consistent overall and sectorial long-term roadmaps illustrating:
  - the link among demand requirements, the space solution offered through ESA programmes and missions, the expected benefit for Member States and citizens,
  - the link between research and technology developments and their planned utilisation in ESA programmes and missions,
  - the overall coherence in the optimal utilisation in ESA programmes and missions of all ESA developed products, so implementing in particular the relevant principles included in the Resolution on Launchers (ESA/C-M/CLXXXV/Res. 3 (Final)) adopted today,

and outlining how ESA programmes and missions can on the one hand enhance European competitiveness, and on the other hand lead to the availability, reliability and upgrading of space-based services and applications required to achieve Europe's overall objectives, be they strategic, economic, social, cultural, scientific, or technological, and improve the daily life of European citizens;

- 23. AGREES that for the implementation of such a Long-Term Plan, the Agency shall provide the necessary technical and managerial skills, both through its own resources and expertise and by availing itself of the competences and expertise existing in Europe, both in the public and in the private sector;
- 24. INVITES the Director General to further elaborate, on the basis of the above strategic guidelines, such a Long-Term Plan 2006-2015, to issue a report to Council by March 2006 giving his evaluation on the progress achieved and submit the Long-Term Plan to Council for endorsement on a yearly basis starting from 2006, in accordance with the Financial Regulations. Thereafter, a report will be issued by the Director General on an annual basis giving the progress of the implementation of the endorsed Long-Term Plan;

# CHAPTER III DECISIONS ON PROGRAMMES AND ACTIVITIES

- 25. WELCOMES the decisions taken this day in respect of the Agency's mandatory activities and optional programmes, implementing the first step of the 2006-2015 Long-Term Plan and pursuing its strategic guidelines, as follows:
  - a) the decisions including:
    - the Resolution on the Level of Resources for the Agency Mandatory activities 2006-2010 adopted by Council on the same date hereof;
    - the subscription to the European Space Exploration Programme Aurora, comprising its first Exploration mission ExoMars and a Core Programme to prepare for future exploration missions;
    - the subscription to the Earth Observation Envelope Programme;
    - the subscription to the ELIPS Programme Period 2;

which confirm the engagement by ESA Member States to boost the progress in science, and to be at the leading edge of discovery, thus supporting the development of competitive services and future applications for European citizens;

- b) the decisions including:
  - the subscription to the ARTES Programme, focused on the telecommunication technologies, applications and mission demonstrations, including in particular the preparation of the AlphaSat Programme;
  - the subscription to the GSTP Programme, aimed at developing and demonstrating in-orbit advanced technologies as well as stimulating new services, and in particular at preparing and demonstrating new concepts such as formation flying satellites which may achieve breakthroughs in future space systems and enable missions of strategic and economic value for space science, Earth observation and new domains, in particular related to security;

which both contribute to consolidate European competitiveness and technological excellence in cooperation with industry and operators;

- c) the decisions including:
  - the subscription to the GMES Space Component Programme, representing also a key European contribution to the GEOSS initiative;

 the subscription to the GSTP Programme for the preparation of a new dedicated technology programme, focused on the development of technologies in particular for non-dependence and security;

which, together with those relevant to the development and exploitation of the European launchers, are focused on the non-dependence and availability of European sources;

d) the decision regarding the subscription to the programme conducted in the frame of international cooperation, i.e. the International Space Station Exploitation Programme Period 2;

which, together with science and the other exploration programmes mentioned in point a) above, consolidate the cooperation with space faring countries, while the programmes related to competitiveness, non-dependence and availability of European sources mentioned in points b) and c) above provide the necessary balance in the domain of relations with international actors;

- 26. WELCOMES, for the implementation of the above activities and programmes, the entry into force on this day of the Declarations, amended Declarations, and amended additional Declarations or their subscriptions by the Participating States concerned, the corresponding financial envelopes being indicated at 2006 economic conditions, or at other economic conditions when specified;
- 27. INVITES the Director General to elaborate, in close coordination with the European Community, an organisational scheme and implementation plan for the GMES initiative to ensure its long-term operational sustainability and enable timely responses to policy and user requirements and to propose relevant decisions to Council for approval;
- 28. WELCOMES the Enabling Resolution on the European GNSS Evolution Programme adopted by the Council on 3 November 2005 (ESA/C/CLXXXI/Res. 1 (Final)) and invites Member States to finalize the relevant Declaration and subscriptions so as to allow the start of the programme activities during 2006;

# CHAPTER IV DECISIONS TO BE PREPARED FOR THE COUNCIL AT MINISTERIAL LEVEL PLANNED FOR 2008

- 29. INVITES the Director General to prepare, in close coordination with Member States, and based on the decisions taken on the same date hereof, the elements contributing to the progressive development of an overall European Space Policy and Programme to be endorsed by the Space Councils before 2008, following consultations with the high-level representatives of the Member States of the Agency and of the European Community as foreseen in art. 8.4 of the Framework Agreement mentioned in the preamble;
- 30. INVITES the Director General to enhance cooperation with the EU, including in the frame of the cooperation established with the European Community under the Framework Agreement mentioned in the preamble, for developing multipurpose and security related technologies, in addition to those in support of already identified EU policies;
- 31. INVITES the Director General to prepare decisions to be proposed at the next Ministerial Council planned for early 2008, concerning among others:
  - the launchers sector, consistent with the Resolution on the evolution of the European Launcher Sector (ESA/C-M/CLXXXV/Res. 3 (Final)) adopted on the same date hereof;
  - the ISS programmes, consistent with the Resolution on the International Space Station (ESA/C-M/CLXXXV/Res. 6 (Final)) adopted on the same date hereof;
  - the further Agency contribution to the GMES initiative, on the basis of the arrangements to be concluded with the European Community;
  - the development of further meteorology programmes responding to Eumetsat requirements;
  - the development and in-orbit demonstration of a system of satellites flying in formation, on the basis of preparatory activities decided today:
  - the next steps for exploration, on the basis of preparatory activities decided today for the Core programme and of discussions with international partners engaged in exploration activities;
  - the start of a dedicated technology programme for the development of critical technologies for European non-dependence, of enabling technologies for civil security applications and of applications of multipurpose technologies to the space sector.

# RESOLUTION ON THE LEVEL OF RESOURCES FOR THE AGENCY'S MANDATORY ACTIVITIES 2006-2010

# (adopted on 6 December 2005)

Council, meeting at Ministerial Level,

HAVING REGARD to Articles V.1 (a) and XI.5 (a) (ii) and (iii) of the Convention,

HAVING REGARD to the Director General's proposal for the Level of Resources for the Agency's mandatory activities 2006-2010 (ESA/C-M(2005)21),

- 1. DECIDES by a unanimous vote of all Member States to determine the level of resources to be made available to the Agency for the period 2006-2010, which is broken down as follows:
  - (a) for the Scientific Programme, an amount of 2080.0 MEuro,

2006	2007	2008	2009	2010	TOTAL
395.7	405.6	415.8	426.1	436.8	2080.0

(b) for the Agency's basic activities, an amount of 998.0 MEuro,

2006	2007	2008	2009	2010	TOTAL
199.6	199.6	199.6	199.6	199.6	998.0

to be financed by:

- 188.6 MEuro of contributions by Member States and Canada per year, amounting to 943.0 MEuro;
- 11.0 MEuro of other income per year, amounting to 55.0 MEuro.

The amounts mentioned in sections (a) and (b) are in MEuro at current economic conditions and are not subject to any form of adjustment for price variations.

- STRESSES its wish to ensure the implementation of planned missions and preparations for the follow-on Cosmic Vision 2015-2025 Programme based on a detailed analysis of risk and cost for each mission approved by the Science Programme Committee of the Agency.
- 3. UNDERLINES the excellence of the Scientific Programme, its worldwide reputation resulting from its successful scientific missions, its broad international cooperation and its contribution to the development and qualification of advanced technologies, supporting the general expertise of the Agency, its Member States and industry; and INVITES the Director General to continue to develop international cooperation on scientific projects.
- 4. INVITES the Director General to take the necessary steps to enhance the synergies of the Scientific Programme with:
  - (a) the other programmes of the Agency in the fields of space exploration, Earth observation and ISS utilization; and
  - (b) the Member States' programmes, other European programmes and international cooperative ventures.

## **@esa Ministerial Council**

58

- 5. UNDERLINES the importance of the basic activities as an essential element for the Agency's technological and managerial capabilities; EXPRESSES its support to the Director General in his efforts to optimise the use of the resources of the General Budget, with emphasis on providing, within the Technology Research Programme (TRP), qualified technologies, and on supporting, within the General Studies Programme (GSP), the preparation of future activities, with the overall objective of reducing the risks for new space missions; EXPRESSES its support to the objectives and the continuation of the Earthnet Programme; and EXPRESSES further its support to the activities undertaken in the Technology Transfer and Education Programmes.
- 6. NOTES that Greece and Luxembourg are participating for the first time in the formal decision on the Agency's Level of Resources and INVITES the Director General to continue the Agency's dedicated exercise of involving industrial and scientific organisations of these Member States in activities financed through the budgets for the mandatory activities, with a view to achieving the appropriate level of participation of the interested entities at the earliest opportunity.

esa bulletin 125 - february 2006

# RESOLUTION ON THE EVOLUTION OF THE EUROPEAN LAUNCHER SECTOR

(adopted on 6 December 2005)

Council, meeting at Ministerial Level,

HAVING REGARD to the Resolution on the restructuring of the Ariane launcher sector (ESA/C-M/CLXV/Res. 1 (Final)) and to the Resolution on 2010 perspectives for the European launcher sector (ESA/C-M/CLXV/Res. 4 (Final)), both adopted at Ministerial Level on 27 May 2003,

HAVING REGARD to the Resolution on directions for the Agency's evolution and policy: "Space Serving European Citizens" (ESA/C-M/CLIV/Res. 1 (Final)), adopted at Ministerial Level on 15 November 2001, and in particular Chapter VI thereof on the evolution of the European launcher sector,

HAVING REGARD to the Declaration by certain European Governments on the Ariane launcher production phase, which entered into force on 20 December 2001 and is applicable until the end of 2006 (the "Ariane Production Declaration"),

HAVING REGARD to the Resolution on the Agency's mandate for the current Ariane launcher production phase and the evolution towards an overall coherent strategy in the European launcher sector (ESA/C/CLXIX/Res. 4 (Final)) adopted on 4 February 2004,

HAVING REGARD to the Resolution on the renewal of the Ariane launcher production phase (ESA/C/CLII/Res. 1 (Final)), adopted on 11 October 2001, by which Council has accepted that the Agency should fulfil the mandate entrusted to it by the Governments party to the Ariane Production Declaration,

HAVING REGARD to the Convention between the Agency and Arianespace on the Ariane launcher production phase, signed on 3 April 2004 ("The 2004 ESA/Arianespace Convention") and its Riders, and in particular its Rider 5.3 on the exploitation of the Soyuz launcher from the CSG (ESA/C(2005)18),

HAVING REGARD to the general principles of the bilateral framework agreements on the use of the Ariane launcher to be concluded between the Agency and European user institutions (ESA/C(2004)37), approved on 4 February 2004,

HAVING REGARD to the Agreement between the European Space Agency and the Government of the French Republic on the Agency's launch sites and associated facilities at the CSG (hereinafter referred to as "The ELA Agreement") signed on 11 April 2002,

HAVING REGARD to the Declaration on the Small Launcher Development Programme (ESA/PB-ARIANE/CLXXI/Dec. 2, rev. 10 (Final)), drawn up on 24 June 1998,

HAVING REGARD to the Additional Declaration to the Small Launcher Development Programme on the P80 solid-propulsion stage demonstrator drawn up on 15 December 2000 (ESA/PB-ARIANE/CLXXXIII/Dec. 1, (Final), rev. 1),

HAVING REGARD to the Resolution concerning cooperation between ESA and Russia in the field of launchers (ESA/C/CLIX/Res.3 (Final)), adopted by Council in Montreal (Canada) on 13 June 2002,

HAVING REGARD to the Declaration on the Soyuz at the CSG Programme (ESA/PB-ARIANE/CCVI/Dec. 2, rev. 2 (Final)) drawn up on 4 February 2004,

HAVING REGARD to the Agreement between the European Space Agency and the Russian Federal Space Agency on long-term cooperation and partnership in the field of the development, implementation and use of launchers (hereinafter referred to as "The ESA/FSA Launcher Agreement"), signed in Moscow on 19 January 2005,

HAVING REGARD to the Agreement between the European Space Agency and the Government of the French Republic concerning the Soyuz Launch Site (ELS) at the Guiana Space Centre (hereinafter referred to as "The ELS Agreement"), signed on 21 March 2005,

HAVING REGARD to the Resolution on the Agency's legal liability adopted by Council on 13 December 1977 (ESA/C/XXII/Res.3) (hereinafter referred to as "The 1977 Resolution"),

CONSIDERING the provisions of the Treaty on Principles Governing the Activities of States in the Exploration and Use of Outer Space, including the Moon and other Celestial Bodies, of 27 January 1967, the provisions of the Convention on International Liability for Damage Caused by Space Objects of 1 September 1972 and of other multilateral treaties and agreements on the exploration and peaceful uses of outer space, to which the Member States of the Agency are parties, and which the Agency has accepted,

HAVING REGARD to the document entitled "Reference Framework for a coherent implementation, as from 2007, of decisions related to the restructuring of the European launcher sector" (ESA/PB-ARIANE (2005)3, rev 3),

HAVING REGARD to the document entitled "Implementation modalities of the ESA Convention (Article VIII) for launchers" (ESA/C/R(2005)3, rev. 1),

HAVING REGARD to the principles of the Intergovernmental Agreement providing a new framework for the launchers exploitation phase beyond 2008, as included in ESA/GOV. REP. ARIANE DEC.(2005)4,

HAVING REGARD to the Convention of the European Space Agency and in particular Articles II, V and VIII, thereof,

#### I SECURING GUARANTEED ACCESS TO SPACE FOR EUROPE

- 1. UNDERLINES that the guarantee of an available, reliable, and independent access to space at affordable conditions has been and will remain an essential goal for Europe, enabling the implementation of a European Space Policy.
- 2. ACKNOWLEDGES that operational launch systems together with the European relevant industrial capabilities for research and technology, development and subsequent exploitation, an operational launch range and a launch-service provider constitute the main elements of such a guarantee for all European customers, in particular for European institutional missions.
- 3. RECALLS that taking into account the limited size of the European institutional market and the lack of a launch-service procurement policy for European institutional missions, capturing a significant share of the worldwide commercial market has been an important factor in achieving and maintaining such a guaranteed access to space.
- 4. RECOGNISES that such a guarantee requires striking a proper balance between public and private sector commitments in order to support the competitiveness of the European launcher sector.
- 5. NOTES that, following the Council Meeting held at Ministerial Level in 2001, a sharp downturn in the commercial market, not compensated by institutional procurements, and the entry of aggressive new competitors leading to a drastic drop in market prices, endangered the existence of the European launcher sector. These factors, aggravated by the consequences of the failure of the first launch of the Ariane-5 ECA, led in 2003 to the decision to set up the following specific measures in order to secure access to space for Europe in the short term:
  - the Ariane-5 Recovery Plan for a timely return to flight;
  - the European Guaranteed Access to Space (EGAS) Ariane Programme;
  - the Soyuz at the CSG Programme to enhance the flexibility of launch services offered by Arianespace;
  - the Future Launchers Preparatory Programme (FLPP) to prepare the technologies necessary for new launcher developments.
- 6. ACKNOWLEDGES the progress achieved through such measures and through the ongoing industrial restructuring which has led to the successful return to flight of Ariane-5 ECA, and to positive Arianespace financial results.
- 7. ACKNOWLEDGES the progress achieved in the implementation of the small launcher and P80 development programmes referred to in the preamble, and RECOGNISES the need to prepare the Vega exploitation phase in accordance with the principles referred to in Chapter III and taking into account the industrial commitments referred to in the preamble.

- 8. ACKNOWLEDGES the progress achieved in the implementation of the Soyuz at CSG programme referred to in the preamble, and RECALLS that the exploitation of the Soyuz launcher by Arianespace from the CSG is expected to provide significant support to the exploitation of the Ariane launcher.
- 9. RECOGNISES the need to further consolidate the European launcher sector and WELCOMES the confirmation and renewal of Member States' interest in supporting such consolidation through the launcher development programmes subscribed on this same day, as follows:
  - the Ariane-5 ARTA Programme (ESA/PB-ARIANE/CLIV/Dec.3, rev. 12 (Final)), covering all activities during the period 2007-2010:
  - the Ariane-5 ACEP Programme (ESA/PB-ARIANE/CCXX/Dec.2 (Final)) for activities to be undertaken in the period 2006-2010:
  - the Vega Research and Technology Accompaniment (VERTA) Programme (ESA/PB-ARIANE/CCXXII/Dec. 1 (Final)), for activities to be undertaken in the period 2006-2010;
  - the Future Launchers Preparatory Programme (ESA/PB-ARIANE/CCI/Dec.1, rev. 3 (Final)) for activities to be undertaken in Period 2 Step 1 (2006-2009).
- 10. RECOGNISES that beyond the consolidation referred to in paragraph 9, decisions must be taken in 2008, in order to secure the guaranteed access to space for Europe, in accordance with the principles concerning the launchers exploitation phase beyond 2008, including the CSG launch range, referred to in Chapters III and V below, and on the basis of the following criteria:
  - sustainability of the European industrial launcher sector;
  - adaptation to the core European institutional needs;
  - innovative technological and industrial capabilities providing quick reactivity to respond to the evolving launch-service demand;
  - relevance of the launchers development to user requirements.

## II THE ARIANE LAUNCHER EXPLOITATION UP TO END-2008

- 11 WELCOMES the extension of the Ariane Production Declaration up to end-2008 and ACCEPTS that the Agency fulfils the mandate entrusted to it by the Governments party to the Ariane Production Declaration, from the date of its entry into force.
- 12. INVITES the Director General to negotiate the extension of the 2004 ESA/Arianespace Convention referred to in the preamble, which should remain in force for the same duration as the Ariane Production Declaration, hereafter referred to as "The ESA/Arianespace Convention".
- 13. ACCEPTS, subject to the terms of the ESA/Arianespace Convention, to make available to Arianespace or, with the latter's agreement, to its suppliers, the production master files and facilities owned by the Agency, funded by the Ariane development programmes, necessary for the manufacture, marketing and launch of the operational Ariane launcher, together with its intellectual property rights deriving from the Ariane development programmes.
- 14. ACCEPTS that the Ariane Launcher Programme Board is entrusted with the role set out in Section II.9 of the Ariane Production Declaration.
- 15. ACCEPTS that the Director General shall exercise the duties of depository of the Ariane Production Declaration and also those set out in Section IV.2 thereof.

# III PREPARATION OF A NEW FRAMEWORK FOR THE LAUNCHERS EXPLOITATION PHASE BEYOND 2008

16. CONSIDERING the importance of the guarantee of access to space for Europe as referred to in paragraph 1, RECOGNISES the need to prepare a common framework for the launchers exploitation phase beyond 2008 implementing a coherent European launcher strategy and succeeding to the scheme of the Ariane Production Declaration, based on the following principles:

## **@esa Ministerial Council**

- a) Such guaranteed access to space shall be assured by (i) launchers developed and produced by European industry, primarily designed to respond to European institutional mission needs, (ii) an operational European launch base, and (iii) European industrial capabilities.
- b) The European launch base shall be maintained in operational condition so as to allow ready access to space for all Member States.
- c) ESA launcher programmes shall be primarily focused on research, technology and development activities, thus contributing, together with national space programmes, to reinforcing European industrial capabilities.
- d) When launchers are developed within the framework of the Agency's programmes ("ESA-developed launchers"), a launch-service provider, reflecting the interests of the European launcher industry, shall be entrusted with the execution of the exploitation phase of such launchers in compliance with the roles and responsibilities defined in ESA/PB-ARIANE(2005)3, rev. 3, referred to in the preamble.
- e) Following an ESA Council decision, non-ESA developed launchers may be operated by the launch service provider from the CSG in compliance with the relevant Agreements to be concluded between ESA and France, and under the condition that their exploitation:
  - is defined in specific arrangements to be concluded between the launch-service provider and ESA;
  - is in support to the exploitation of ESA-developed launchers in accordance with the payload allocation policy referred to in paragraph 20 below;
  - does not induce any additional costs for Member States.
- f) The utilisation of ESA-developed launchers for appropriate payloads of European institutional missions shall be in line with the following principles:
  - (i) The launch-service procurement for ESA missions shall comply with the provisions of Chapter IV.
  - (ii) Member States are invited to take the ESA-developed launchers and the Soyuz launcher operated from the CSG into account, on the basis of the principles contained in Chapter IV, when defining and executing their national programmes as well as the European and other international programmes in which they are involved, except where such use compared to the use of other launchers or space transport means available at the envisaged time presents an unreasonable disadvantage with regard to cost, reliability or mission suitability.
- 17. INVITES the Director General, in close consultation with Member States, to pursue discussions with the European Community so as to assess the conditions for setting up a regulatory framework governing: (i) the procurement of launch services for programmes of the European Community and for other European institutional programmes, (ii) competition so as to ensure a level playing field for Europe in the worldwide market for launch services.
- 18. NOTES that Member States shall conclude as soon as possible and by end-2006 at the latest, on the basis of the relevant provisions of Chapter III, an Intergovernmental Agreement with a view to its entry into force on 1 January 2009, and NOTES the principles of the Intergovernmental Agreement referred to in the preamble.
- 19. NOTES that Member States participating in the relevant Agency launcher development programmes shall conclude, within the frame of the Agency, as soon as possible and in time for the entry into force of the above Intergovernmental Agreement, the relevant exploitation agreement(s) for Ariane and Vega, setting the specific principles for the exploitation phase of each launcher concerned, in compliance with the provisions of the Agreement referred to in paragraph 16.
- 20. INVITES the Director General to conclude with the launch-service provider specific arrangements in order to implement the principles contained in such exploitation agreements. Such arrangements shall in particular contain the commitment of the launch-service provider to:
  - implement a payload allocation policy with the objective to secure, for each launcher, the minimum launch rate contributing to
    maintain the European industrial capabilities necessary to secure the guarantee of access to space for Europe and taking into
    account the range of their respective performances;

- a business plan, defined on the basis of committing objectives agreed with the Agency such as cost, reliability, launch rate capability, and schedule and jointly agreed, with respect to ESA developed launchers, with the relevant launcher-system prime contractor;
- provide full visibility to ESA Member States.
- 21. NOTES that, for ESA-developed launchers other than Ariane, the regime defined by the 1977 Resolution needs to be adapted according to the following principles:
  - This liability shall be shared between France and ESA, in their capacity as launching States; France shall bear one-third of such liability and ESA two-thirds. ESA's liability shall be shared, according to a scale to be agreed, among Member States which are both participating in the relevant launcher development programme(s) and having an industrial return in their exploitation.
  - Other States may, if appropriate, share such liability, it being understood that, unless otherwise agreed among the parties concerned, the liability share of ESA in its capacity as launching State will be reduced accordingly.
  - The launch-service provider shall be required to reimburse the parties mentioned above, according to their above-mentioned liability shares, the amount they may be liable to pay for any damage caused by the relevant launches, within a ceiling of 60 MEuro per launch.
- 22. INVITES the Director General to take all necessary actions in order for such principles concerning international liability for the Vega launches to be effective as from 1 January 2009, it being understood that the international liability schemes currently applicable to the Ariane and Soyuz launches and defined in the relevant agreements referred to in the preamble, shall remain unchanged.

#### IV. LAUNCH-SERVICE PROCUREMENT POLICY FOR ESA MISSIONS

- 23. CONSIDERING the importance of ensuring coherence among the different Agency programmes and TAKING ACCOUNT of the requirements of the programmes for which launch services are to be provided, the Director General shall comply with the following principles when implementing Article VIII of the ESA Convention:
  - a) any new satellite platform, satellite or mission to be developed by the Agency, shall be conceived so as to be compatible with the use of at least one of the ESA-developed launchers or with the Soyuz launcher operated from the CSG, within the range of their respective performances, unless this is not feasible in respect of reliability and mission suitability;
  - b) any new mission to be developed by the Agency shall plan for a launch-service back-up solution and the conditions for its use shall be defined at the time of the selection of the launcher envisaged for that mission;
  - c) preference shall be granted to launchers, referred to in Article VIII.1 of the ESA Convention, in the following order of priority:
    - ESA-developed launchers,
    - the Soyuz launcher operated from the CSG, when comparing the options to launch ESA missions by non-ESA-developed launchers,
    - other launchers,

provided that such preference does not present an unreasonable disadvantage in respect of cost, in accordance with paragraph 24, reliability and mission suitability.

24. ENDORSES the implementation modalities of the ESA Convention (Article VIII) for launchers, as included in ESA/C/R(2005)3, rev.1 and AGREES that the launch-service costs provided for therein do not constitute, for future ESA missions, an unreasonable disadvantage within the meaning of Article VIII of the ESA Convention. Consequently, subject to the provisions of paragraph 27,

## **@esa Ministerial Council**

the Director General shall assess the cost of ESA missions in the relevant programme proposals on the basis of ESA/C/R(2005)3, rev.1. As a result the Scientific Programme and the Programme Declarations requiring the use of launch services shall include, in compliance with such launch-service costs, the relevant financial provisions.

- 25. ACKNOWLEDGES that Member States which fulfil at least one of the following two conditions: (i) no participation in the relevant ESA launcher development programmes, (ii) no industrial return in the relevant launchers' exploitation, have no undertaking to ensure that the launch services making use of ESA-developed launchers stay within the costs referred to in paragraphs 24 and 27.
- 26. TAKES NOTE that the VERTA Programme referred to in the preamble provides for the necessary means to ensure that no additional costs with respect to those currently referred to in Programme Declarations in force on the day of the approval of the present Resolution, will be borne by States participating in programmes requiring the use of the Vega launch services covered by the VERTA Programme, and TAKES NOTE that in case of delays in the Vega qualification which would introduce unreasonable delays for a planned ESA mission on a VERTA flight, Rockot will provide the related launch service unless this is not feasible with respect to cost, reliability and mission suitability.
- 27. INVITES the Director General to submit every two years to Council a status report on the evolution of the respective launch services for Ariane, Vega and Soyuz, and further INVITES the Director General to perform periodic reviews of launch services for ESA missions, starting with the following reviews:
  - (i) for Ariane, in time for a decision in 2009 and consistent with the decision taken under the EGAS Ariane Programme;
  - (ii) for Soyuz, in 2010, consistent with Rider 5-3 to the ESA/Arianespace Convention referred to in the preamble;
  - (iii) for Vega before the start of the production of Vega launchers following the ten initial launchers after qualification.

The Director General shall provide Council with full transparency on the result of such reviews including a market assessment and any variation of the launch service costs, in particular taking into account the learning process during the launcher production phase. The Director General shall conclude the relevant arrangements with the launch-service provider so as to enable the Agency, or independent entities mandated by the Agency, to perform the necessary verifications and audits throughout the contractual chain.

On that basis, the Director General shall propose to Council for decision to be taken by a two-thirds majority of all Member States, the new launch-service costs for ESA missions.

#### V. CSG LAUNCH-RANGE FUNDING

- 28. STRESSES that the adoption on this day of the Resolution on the CSG Extension until end-2008 (ESA/C-M/CLXXXII/Res.4 (Final)) is an essential element of the guarantee of access to space.
- 29. INVITES the Director General, together with CNES, the launch-service provider and industry, to complete the reorganisation of the industrial activities at the CSG, in order to further decrease the costs of the CSG launch range, taking into account its specificities.
- 30. INVITES the Director General to propose a new funding scheme, applicable as from 2009, to be included in a Resolution to be adopted by Council by a unanimous agreement of all Member States, based on the principles below:
  - i) The scheme adopted on this same day for the funding of the CSG Launch Range fixed costs related to Ariane exploitation (2006-2008) shall be extended to cover the total fixed costs related to the exploitation of Ariane, Vega, and Soyuz as follows:
    - 1/3 funded by France;

64

- 2/3 funded by ESA Member States and the launch-service provider on the basis of a nominal mission model to be agreed. The ESA Member States' contribution will be calculated according to a scale to be agreed among ESA Member States, reflecting a balance between solidarity and industrial return in exploitation. The costs corresponding to the exploitation of Ariane and Vega shall be borne by ESA Member States, while the costs corresponding to the exploitation of Soyuz shall be borne by the launch-service provider. It is understood that the exploitation of Vega will not introduce additional costs for the States which fulfil at least one of the two following conditions: (i) no participation in the Vega small-launcher development programmes, and (ii) no benefit from the industrial activities associated with the exploitation of the Vega launcher.

esa bulletin 125 - february 2006

ii) All CSG Launch Range variable costs actually incurred shall be borne by the launch-service provider.

The above-mentioned scheme shall be applied as appropriate to any new launcher operated from the CSG.

31. NOTES that the industrial return related to the exploitation phase of Ariane, Vega, and Soyuz shall be calculated in compliance with applicable ESA rules, procedures and practices.

#### VI. NEXT STEPS TO PREPARE DECISIONS TO BE TAKEN IN 2008

- 32. ACKNOWLEDGES the ESA Launchers Strategic Plan 2006-2015 proposed by the Director General in ESA/PB-ARIANE(2005)22, rev. 4, as an important step for preparing the relevant decisions to be taken in 2008.
- 33. NOTES that the strategy for guaranteeing access to space for Europe may need adaptations to take into account factors such as the evolution of institutional needs, of the commercial market, and of the competition, impacting in particular the sustainability of the European industrial launcher sector, and UNDERLINES the importance of the ongoing mitigation measures, such as the additional efforts on industrial restructuring, and of the Future Launchers Preparatory Programme activities.
- 34. INVITES the Director General, in consultation with the launch-service provider and industry, to continuously assess the ability of the European industrial launcher sector to guarantee access to space for Europe and to develop, with the support of Member States, possible scenarios for the evolution of the European launcher sector so as to respond in the short/medium term to the launcher-sector needs preparing for decisions in 2008.

## **RESOLUTION ON THE CSG - EXTENSION UNTIL END-2008**

(adopted on 6 December 2005)

Council, meeting at Ministerial Level,

HAVING REGARD to the Resolution on the CSG (2002-2006) (ESA/C-M/CLIV/Res. 3, rev.1 (Final)) adopted at Ministerial Level on 15 November 2001, as amended by Resolution ESA/C/CLXIX/Res. 5 (Final) adopted on 4 February 2004, hereinafter called "The CSG Resolution",

RECALLING the Resolution on the industrial-policy provisions applicable to EOEP, ELIPS, FLPP, ISS Exploitation and CSG (ESA/C/CLXXIX/Res. 5 (Final)) adopted on 22 June 2005,

HAVING REGARD to the Resolution on the evolution of the launcher sector (ESA/C-M/CLXXXV/Res. 3 (Final)), adopted at Ministerial Level on this day, and in particular Chapter V,

HAVING REGARD to the Declaration by certain European governments on the Ariane launcher production phase, hereinafter called "The 2001 Production Declaration", drawn up on 7 June 2001, and its extension until end-2008,

HAVING REGARD to the Resolution on the renewal of the Ariane launcher production phase (ESA/C/CLII/Res. 1 (Final)), adopted on 11 October 2001, by which Council has accepted that the Agency should fulfil the mandate entrusted to it by the Governments party to the Ariane Production Declaration,

HAVING REGARD to the Convention on the Ariane launcher production phase concluded between the Agency and Arianespace on 3 April 2004, which upon signature shall remain in force for as long as the above-mentioned Production Declaration remains in force,

HAVING REGARD to the Agreement between the French Government and the Agency on the Guiana Space Centre (CSG) (2002-2006) signed on 11 April 2002,

HAVING REGARD to the Agreement between the European Space Agency and Government of the French Republic on the Agency's launch sites and associated facilities at the CSG (hereinafter referred to as "The ELA Agreement"), signed on 11 April 2002,

HAVING REGARD to the Agreement between the European Space Agency and the Government of the French Republic concerning the Soyuz Launch Site (ELS) at the Guiana Space Centre (hereinafter referred to as "The ELS Agreement"), signed on 21 March 2005,

HAVING REGARD to the addendum to the Director General's technical and financial proposal on the CSG funding, covering the period 2006-2008 (ESA/PB-ARIANE(2005)72, rev. 2),

HAVING REGARD to the document entitled "Reference Framework for a coherent implementation, as from 2007, of decisions related to the restructuring of the European launcher sector" (ESA/PB-ARIANE(2005)3, rev. 3),

- 1. DECIDES to extend the CSG Resolution for the period 2006-2008, using for this purpose the provisions contained in the corresponding Resolution adopted on 15 November 2001 and amended on 4 February 2004, also taking into account Resolution ESA/C/CLXXIX/Res.5 (Final)) referred to in the preamble, as such provisions are modified as follows:
  - 1.1 by replacing the title with the following: "Resolution on the CSG (2002-2008)";
  - 1.2 by adding in the preamble the following:
  - "HAVING REGARD to the Resolution on the CSG Extension until end-2008 ESA/C-M/CLXXXV/Res. 4 (Final),

HAVING REGARD to the addendum to the Director General's technical and financial proposal on the CSG funding, covering the period 2006-2008 (ESA/PB-ARIANE(2005)72, rev. 2),"

- 1.3 by replacing Section II thereof with the following:
- "II. AGREES on the following funding arrangements:
  - II.1 The amount of funding to be contributed by the Agency in respect of the fixed costs incurred by CNES at the CSG to meet the requirements of the Ariane programmes (including the production phase thereof entrusted to Arianespace) shall be set for the period 2006-2008; this amount shall be fixed, subject to updating according to the Agency's rules and procedures. This amount shall also cover the industrial costs included in the CSG contract referred to in Section VII.1 (b) in compliance with the provisions of Section II.2.

It should be noted that, in accordance with the provisions of paragraph V.1, the contributions of the Member States to the above-mentioned fixed costs of the CSG shall be alleviated according to the system involving Arianespace defined in the Convention between ESA and Arianespace referred to in the preamble.

II.2 For the period 2006-2008, the total amount of CNES/CSG fixed costs taken into account in this Resolution is estimated at 366.3 MEuro\*; the funding for CNES/CSG fixed costs (excluding the Agency's internal costs) to be contributed by the Agency for the period 2006-2008 shall be a fixed amount of 244.2 MEuro. The Agency's internal costs during this period 2006-2008 are estimated at 6.9 MEuro. In addition an amount of 20 MEuro shall be set up to cover industrial costs included in the CSG contract referred to in Section VII.1 (b) which are due in the event no decision on the Agency funding of CNES/CSG fixed costs for the new period beyond 2008 is taken within the time limit mentioned below. The total amount of funding to be contributed by the Agency shall thereby amount to 271.1 MEuro.

The additional amount of 20 MEuro shall, if no decision on the Agency funding of CNES/CSG fixed costs for the new period beyond 2008 is taken by 30 June 2008 pursuant to Section XI, be automatically incorporated into the 2009 budget for the CSG to be adopted according to the Agency's rules and procedures. The Director General shall report to the Ariane Launcher Programme Board and to the Administrative and Finance Committee on the disbursement of this above-mentioned amount.

If the decision on the Agency funding of CNES/CSG fixed costs for the new period beyond 2008 referred to Section XI is taken after the above-mentioned date and before the end of the year 2008, a revised 2009 annual budget for the CSG will be submitted to Member States for approval, on the basis of the new legal instrument covering such continuation.

- II.3 The fixed amount of Agency funding for the CNES/CSG costs including the additional amount quoted in Section II.2 above may not be varied other than in the event of a substantial change in the activities to be provided by CNES at the CSG, which shall be taken into account by a procedure agreed between CNES and the Agency; any substantial change shall be referred to the Ariane Launcher Programme Board for examination and recommendation to Council for approval.
- II.4 On the basis of estimates supplied by CNES of total CNES/CSG costs, which shall be examined and negotiated between the Agency and CNES, and on the basis of a review concerning the relative weight of GNP and the production return in the scale of contributions, the Director General shall submit to Council a proposal on Agency funding of CNES/CSG for a period beyond the year 2008. Council shall before 30 June 2008 decide the amount of funding to be contributed to CNES/CSG by the Agency for this new period and the applicable scale of contributions".
- 1.4 by replacing Section III thereof with the following:

"III.1 AGREES that the Member States' contributions shall be established in accordance with a composite scale half of which shall be calculated on the basis of the scale applicable to Member States for the Agency's mandatory activities and half on that of the estimated Ariane production geographical distribution scale; this composite scale shall be adjusted each time the above scale applicable to Member States for the Agency's mandatory activities is changed in accordance with Agency rules; the composite scale applicable during the period 2006-2008 is given in Annex I hereto;

\* All the amounts in MEuro quoted in this Resolution are expressed at 2006 economic conditions, except when stated otherwise.

III.2 At the end of the period 2006-2008, the initial composite scale shall be retroactively adjusted by taking into account the actual Ariane production geographical distribution scale calculated on the basis of the actual number of Ariane-5 launches carried out in that period."

1.5 by adding the following at the end of Section IV.1 thereof:

"For the period 2006-2008, the financing of CNES/CSG activities under the Agency Vega Programme will be funded by the participants in the programme slices concerned; and ACKNOWLEDGES that Arianespace has undertaken to cover the fixed and variable costs associated with the use of the CNES establishment in French Guiana (CNES/CSG) for the purpose of the exploitation of the Soyuz-ST launchers from CSG."

1.6 by replacing Section VII.1 thereof with the following:

"VII.1 INVITES the Director General to conclude on the basis of this Resolution:

- (a) an extension until end-2008 of the CSG Agreement with the French Government referred to in the preamble;
- (b) a new contract with CNES, to take effect as from 1 January 2006, covering the years 2006 to 2011, it being understood that the previous contract with CNES referred to above shall be terminated at the end of the year 2005. This new contract shall lay down the arrangements for applying the above-mentioned Agreement and specifying the services to be provided by CNES and the arrangements for funding and control by the Agency, and its association to the strategic decision making process referred to in Section VII.2 of the present Resolution. On the basis of the provisions in Section II above, the contract shall be divided into two periods:
  - A first period covering the years 2006, 2007 and 2008, for which the amount of funding to be contributed by the Agency, including the additional amount referred to in paragraph II.2, is fixed.
  - A second period covering the years 2009, 2010 and 2011, for which the amount of funding mentioned in ESA/PB-ARIANE(2005)72, rev. 2 referred to in the preamble, is a ceiling price. This ceiling price shall be converted into a fixed price and will, subject to the decision to be taken pursuant to Section XI, be incorporated in the follow-on contract covering the period beyond 2008."
- 1.7 by replacing Section VIII.5 thereof with the following:

"VIII.5 STRESSES the need to foster the participation of European industry in the investment and exploitation activities, on the basis of the following measures:

- (a) by implementing a procurement policy aiming at drawing the maximum benefits, in terms of cost reduction and enhancement of opportunities for industry, from the synergies between all investment and exploitation activities performed on the site, including the activities concerning CNES/CSG and the Ariane launch site (ELA);
- (b) by implementing a system of active monitoring of the evolution of the industrial return allowing to dynamically adapt the targets applied to the procurement actions to the actual return situation, with a view to reach a return objective of 1 for each Member State;
- (c) by introducing a guarantee for each Member State of a minimum return coefficient of 0.84 at the end of 2008;
- (d) by performing, in mid-2006, an intermediate review of the achieved industrial return over the period 2002-2006 and of the forecasts at the end of 2008. On the basis of this review, should any deficit be forecasted, corrective actions shall be taken, including, in decreasing order of priority:
  - industrial activities to be committed for CNES/CSG over the period 2007-2008;
  - other industrial activities on the CSG site in the period 2007-2008.

These corrective actions shall be defined for each Member State concerned by taking into account potential surplus industrial activities originated in other Agency programmes concerning the CSG site:

- (e) by performing, at the end of 2008, a formal review of the achieved industrial return over the period 2002-2008. The remaining deficits with regard to the minimum return coefficient of 0.84 shall be balanced in 2009 under a scheme to be agreed between the States concerned;
- (f) by duly documenting in the Agency's statistics the actions referred to in sub-sections VIII.5(d) and VIII.5(e) above."
- 1.8 by replacing Section XI with the following:
- XI. AGREES to review all the arrangements contained in this Resolution in due time with a view to establishing at the latest by 30 June 2008, the arrangements for Agency funding of CNES/CSG beyond the year 2008, and to that end INVITES the Director General of the Agency, in consultation with the Director General of CNES, to submit to the Member States, in due time and no later than end-December 2007, a proposal on Agency funding of CNES/CSG beyond the year 2008, including the legal arrangements required to cover that continuation."
- 1.9 by replacing Section 1 of the Annex thereto with the following:
- "1. Scale of contributions by Member States to the funding of CNES/CSG
  - (a) The composite scale applicable for the period 2006-2008 is as follows:

Country	Contribution scale as %
Austria	1.47
Belgium	4.36
Denmark	0.88
Finland	0.70
France	35.75
Germany	19.34
Greece	0.79
Ireland	0.63
Italy	10.98
Luxembourg	0.11
Netherlands	3.12
Norway	1.36
Portugal	0.61
Spain	5.07
Sweden	1.95
Switzerland	3.50
United Kingdom	9.42
Total	100

The composite scale shown above has been worked out on the basis of the scale applicable to Member States for the Agency's mandatory activities and the Ariane production geographical distribution scale (defined in ESA/PB-ARIANE(2005)72, rev. 2)".

- 1.10 by replacing Section 2 of the Annex thereto with the following:
- "2. Indicative schedule expenditure

The indicative schedule of expenditure (in MEuro at 2006 economic conditions) is as follows:

70

	2006	2007	2008	2009*	TOTAL	
Estimate of total CNES/CGS fixed costs	125.9	121.2	119.2	20	386.3	
ESA funding for CNES/CSG	83.9	80.8	79.5	20	264.2	
Internal costs	2.3	2.3	2.3	-	6.9	
Total ESA funding	86.2	83.1	81.8	20	271.1	
* Year corresponding to the possible call up of the additional amount pursuant to Section II.2 of the present Resolution						

- 2. CONFIRMS, notwithstanding Sections II.5 and II.6 of the CSG Resolution of 11 November 2001, as amended, that the budgets adopted on the basis of the CSG Resolution for the year 2005 will not be adjusted retroactively and will therefore remain operative as executed.
- 3. SPECIFIES that the renewed CSG Resolution provided for in Section 1 above will come into force on 1 January 2006, with non-retroactive effect.
- 4. NOTES with appreciation that relevant savings have been achieved in the CSG fixed costs during the period 2003-2005, consistent with the amendments made to the CSG Resolution on 4 February 2004, and NOTES further that these savings were achieved by reductions in costs brought about by the CSG reorganisation and in expenditure pursuant to the CSG capital investment plan.

esa bulletin 125 - february 2006

## RESOLUTION ON THE EVOLUTION OF THE AGENCY

(adopted on 6 December 2005)

Council, meeting at Ministerial Level,

HAVING REGARD to the Resolution on directions for the Agency's evolution and policy: "Space Serving European Citizens" (ESA/C-M/CLIV/Res. 1 (Final)), adopted at Ministerial Level in Edinburgh on 15 November 2001,

HAVING REGARD to the accession of Greece and Luxembourg to the Agency's Convention in the first half of 2005,

HAVING REGARD to the Framework Agreement between the European Space Agency and the European Community, which came into force on 28 May 2004,

HAVING REGARD to the Orientations endorsed by the Councils at Ministerial Level on the occasion of the Space Councils held on 26 November 2004 (ESA/C-M(2004)1, rev.1), 7 June 2005 (ESA/C-M(2005)1), and 28 November 2005 (ESA/C-M(2005)22),

HAVING REGARD to the Resolution on the evolution of the Agency's financial, budgetary and industrial policies (ESA/C/CLXXI/Res.2 (Final)), adopted on 17 June 2004, and to the Resolution on the hierarchy of industrial-policy rules on return coefficients (ESA/C/CLXXIX/Res.4 (Final)), and the Resolution on the Financial Regulations (ESA/C/CLXXIX/Res.7 (Final)), adopted on 22 June and 21 June 2005 respectively,

HAVING REGARD to the Resolution on the Agency's Long-Term Plan for Discovery and Competitiveness (ESA/C-M/CLXXXV/Res.1 (Final)), adopted on this day at Ministerial Level,

HAVING REGARD to the Director General's proposal for the 2005 Council Meeting at Ministerial Level (ESA/C-M(2005)6),

# CHAPTER I THE AGENCY IN AN EVOLVING ENVIRONMENT

- 1. SHARES the Director General's view on the main features of the evolving environment in which the Agency is called to carry out its mission, and EMPHASISES in particular the following factors:
  - (a) an increase in the number and scope of space programmes and activities, with significant involvement of the European Community;
  - (b) the recent enlargement of the European Union and the prospects for further enlargement involving other European States in the short and medium term;
  - (c) the concrete implementation of activities in the framework offered by the Programme for the European Cooperating States (ECS) by industrial and research entities in a number of European States;
  - (d) the far-reaching restructuring of the European space industry and the measures taken to develop a capacity to procure from European sources all critical components and technologies required for the development of space systems and related equipment, as well as the measures taken for enabling competition at system-integrator level, in particular for small and medium-sized missions;
  - (e) a noticeable increase in industrial competition in the space sector with the arrival of new players such as China and India offering quality goods and services at lower costs; and
  - (f) the need for broader involvement of the private sector in the financing of space-related activities in association with the public sector.
- 2. ACKNOWLEDGES the measures already taken towards adapting applicable Agency policies, procedures and systems to the above changes, and INVITES the Director General to further implement those measures and propose subsequent adaptations based on an assessment of the progress made in implementing the said measures and reflecting the evolving environment, in particular in the following domains:

- (a) industrial and procurement policy in order to reinforce the global competitiveness of the European space industry in the delivery of goods and services;
- (b) internal operations, in particular its rules and procedures, with a view to offering to other publicly-funded organisations in Europe a transparent and predictable Agency system for the implementation of their space activities; and
- (c) the Agency's institutional framework for associating all interested European States in its space programmes with a view to reinforcing trans-European cohesion.
- 3. INVITES the Director General to report to the next Council Meeting at Ministerial Level on results achieved.

# CHAPTER II INDUSTRIAL AND PROCUREMENT POLICY

- 4. WELCOMES the outcome of the formal review of the geographical distribution of contracts and return coefficients achieved for the period 2000 to 2004 (ESA/IPC(2005)30) and LOOKS FORWARD to the results of the on-going implementation of the measures decided for correcting return imbalances identified at that review, and RECALLS the Resolution on the hierarchy of industrial-policy rules on return coefficients referred to in the preamble which enables the Agency to increase flexibility in the application of its industrial-return rules, thus encouraging competition.
- 5. UNDERLINES that, in order to enhance the global competitiveness of the industrial sector, a strong technology portfolio is required together with the harmonisation of technology and procurement policies extending beyond the Agency's framework and applied on a voluntary basis, thereby favouring a more open European market promoting innovation and a specialisation-oriented approach, and also facilitating the selection of competitive European equipment in the frame of governmental space procurements in Europe.
- 6. INVITES the Director General to ensure that, in the application of the Agency's procurement policy, due consideration is given to a proper risk-sharing between the Agency and industry, and also between the prime contractors and their respective sub-contractors.
- 7. STRESSES that all categories of firms shall have fair access to the Agency's activities.
- 8. INVITES the Director General to take appropriate measures in order to help consolidate the industrial fabric of the European space sector, taking account of the contributions of all industrial players in order to enrich the European space sector capabilities and competitiveness.
- 9. INVITES the Director General to propose a comprehensive roadmap and associated action plan to Council within six months.

#### CHAPTER III INTERNAL OPERATIONS

- 10. EMPHASISES the need to further strengthen the management of the Agency with a view to continuous optimisation in using its available resources and attracting additional ones, and UNDERLINES the necessity to proceed with the evolution of the financial management system and of the corporate governance system of the Agency so as to continuously increase productivity within the programme running costs and within corporate and administrative activities, and to respond to strategic needs and to new requirements such as the development of the internal security system of the Agency.
- 11. CONVEYS its appreciation to the members of the Audit Commission for having provided their expert opinion on different aspects of the Agency's financial management.
- 12. RECALLS the Resolution on the Financial Regulations, referred to in the preamble, which constitutes a significant improvement of the Agency's financial system, bringing it into line with current best practices.

- 13. INVITES the Director General to implement the actions remaining under the roadmap on reforming the financial management of the Agency (ESAC(2005)78), in line with the recommendations made by the Audit Commission, in close consultation and cooperation with Council and the Agency delegate bodies, with a view to completing the financial reform by end-2008, RECALLS that a report is due in 2008 on the results brought by the implementation of the in-year flexibility and the budgetary planning process, and INVITES the Director General to report annually on the Agency's year-end performance, starting from 2006, on the basis of an agreed list of indicators and taking into account the corresponding objectives to be outlined in the Agency's Long-Term Plan.
- 14. SUPPORTS the Director General in his continuous effort to enhance further the Agency's management methods and tools with a view to increasing accountability and reducing programmatic risks, through the introduction of efficient project planning and corporate control, and consequently pursue the continuous optimisation of the use of the Agency's resources.
- 15. UNDERLINES the importance of having motivated and qualified staff, and ENCOURAGES the Director General to take further measures with a view to developing career planning, strengthening technical and managerial expertise, and supporting staff mobility and the equal-opportunity policy.

# CHAPTER IV APPROACH TO SPACE GOVERNANCE IN EUROPE AND THE POLICY ON ENLARGEMENT OF THE AGENCY

- 16. RECALLS the recommendation made by the Space Council to identify possible cost-efficient scenarios for optimising the organisation of space activities in the future in Europe and to initiate a wide-ranging appraisal of these scenarios in comparison to present processes, and INVITES the Director General to assess the potential consequences of these scenarios on the Agency's role and operations and to inform Council of the outcome of this assessment.
- 17. NOTES the growing interest of several new Member States of the European Union in participating progressively in the Agency's programmes and to foster public interest in space exploration, and RECALLS the joint initiatives between ESA and the European Community such as Galileo and GMES which involve all of these new Member States.
- 18. WELCOMES the implementation of the programme for the European Cooperating States through which the signatory States are given access to the Agency's programmes and INVITES the Director General to:
  - (a) pursue a detailed examination of the existing cooperation framework, and in particular the ECS, with the objective of offering the largest number of European States the possibility to participate in the execution of the Agency's programmes; and
  - (b) assess the impact that the association or accession to the Convention of new Member States may have on the European space sector, the Agency's policies and activities and the Agency's decision-making processes, and report to Council on the outcome of this assessment within six months.
- 19. NOTES the setting-up of the European GNSS Supervisory Authority by the Council of the European Union to manage the public interest relating to the European GNSS and to be its regulatory authority and the provisions, contained in the regulation establishing the Authority, that ESA shall be requested to provide the Authority with its technical and scientific capabilities, and INVITES the Director General:
  - (a) to define and agree, as soon as possible, with the European GNSS Supervisory Authority, the arrangements for the Agency's involvement in the deployment and operational phases of the GNSS programmes, including on the corresponding funding, and
  - (b) to initiate discussions with the European Commission with a view to defining a policy for ESA's involvement in operational phases of joint initiatives, taking into account the relevant orientations endorsed by the Space Council.

## RESOLUTION ON THE INTERNATIONAL SPACE STATION PROGRAMME

# (adopted on 6 December 2005)

Council, meeting at Ministerial Level,

HAVING REGARD to the Resolution on the Agency's Long-Term Plan for Discovery and Competitiveness (ESA/C-M/CLXXXV/Res. 1(Final)), adopted at Ministerial Level on this day,

HAVING REGARD to the Declaration on the European participation in the International Space Station Development Programme (ESA/PB-MS/XI/Dec.1 (Final), rev.3),

HAVING REGARD to the Declaration on the European participation in the International Space Station Exploitation Programme (ESA/PB-MS/XXIX/Dec.1, rev.3 (Final)) amended on this day,

HAVING REGARD to the Declaration on the European Programme for Life and Physical Sciences and Applications in Space - ELIPS (ESA/PB-MG/LXX/Dec.1, rev.5 (Final)) amended on this day,

HAVING REGARD to the Agreement among the Government of Canada, Governments of Member States of the European Space Agency\*, the Government of Japan, the Government of the Russian Federation and the Government of the United States of America (hereinafter referred to as "The Partners") concerning cooperation on the civil International Space Station (hereinafter referred to as the "IGA"), signed on 29 January 1998 and entered into force for the European Partner on 28 June 2005,

HAVING REGARD to the Memorandum of Understanding between the European Space Agency (ESA) and the National Aeronautics and Space Administration of the United States of America (NASA) concerning cooperation on the civil International Space Station (hereinafter referred to as the "Space Station MOU"), signed on 29 January 1998,

- 1. REAFFIRMS that the International Space Station (ISS) Programme is essential for the Agency to consolidate cooperation with other space-faring organisations and to contribute to new discoveries through the realisation of scientific experiments and for the preparation of the exploration of space.
- 2 . CONCERNED with the delays experienced in the ISS assembly, which have resulted in adverse consequences on the ISS Programme as a whole, STRESSES that complete stability must be restored at the earliest opportunity in that programme to ensure that the Partner States and their Cooperating Agencies exercise the rights and discharge the obligations to which they have agreed, respectively, in the IGA and ISS MOUs.

#### 3. RECALLS that:

- the European Partner States, signatory of the IGA, have invested significant resources through the Agency's dedicated programmes for developing ISS elements and equipment, and
- the European scientific communities have also contributed considerable efforts and means in the preparation of ISS utilisation,

with the expectation to reap the benefits of these investments after the launch and in-orbit verification of the Columbus laboratory, through an extensive exploitation of the laboratory and the use of the Automated Transfer Vehicle (ATV) for ISS logistics and re-boost.

- 4. NOTES with appreciation that:
  - NASA has taken significant steps for returning its Space Shuttle to flight, with a view to providing the means for completing

\*Collectively called the European Partner within the meaning of the IGA, whose rights and obligations are exercised and discharged through the European Space Agency.

the assembly of the ISS in a configuration that meets the resources and utilisation requirements of all the Partners, a matter which falls primarily under NASA's responsibility as defined in the ISS Agreements;

- the Russian Space Agency has worked closely with NASA, in particular over the last three years since the Space Shuttle Columbia accident, to ensure the continued sustainability and permanent manning of the ISS, resulting in valuable utilisation opportunities being offered to the other Partners, including through the provision of flights using the Soyuz and Progress vehicles; and
- the US and Russian Partners have taken steps to initiate the development of new crew transportation systems which are intended to be available for servicing the ISS, thereby enhancing its robustness after the retirement of the Space Shuttle system.
- 5. MINDFUL of the uncertainties currently confronting the ISS partnership, EMPHASISES the necessity for the Columbus laboratory to be launched in the timeframe end 2007/early 2008, on the condition that the Director General receives assurances that an adequate level of utilisation resources for the exploitation of the laboratory will be provided, including after the retirement of the Space Shuttle system, consistent with the relevant provisions of the ISS Agreements.
- 6. CALLS for the US Partner to take all necessary measures to restore its portion of the International Space Station Programme to full stability and to ensure that the objectives of the ISS partnership, as agreed by the Parties to the IGA and to the corresponding MOUs among the Cooperating Agencies, are maintained in their entirety.
- 7. ENCOURAGES the Director General to work expeditiously with the other ISS Partners, in particular NASA, to arrange for the launch of the Columbus laboratory in the timeframe indicated above and to establish a robust ISS operations and transport scenario that takes into account the planned retirement of the Space Shuttle in 2010 and the need to enable a permanent crew of six astronauts to work onboard the ISS before such retirement, and INVITES the Director General to continue to involve the Participating States concerned in that process.
- 8. NOTES with satisfaction the completion of European hardware developed for the ISS (Columbus and its payloads, Node-2, Cupola, European Robotic Arm (ERA)), the progress made in the development of the remaining elements (Automated Transfer Vehicle (ATV), Node-3, European Ground Segment) and the implementation of a broad interim ISS utilisation programme in key scientific disciplines, by making use of US and Russian modules.
- 9. BEARING IN MIND that the above-mentioned uncertainties may not be entirely cleared before end-2007, EMPHASISES the need to manage the activities within the ISS Exploitation Programme in a manner that will ensure both that the European Partner maintains in full its capability to reap the benefits entailed by its participation in the ISS partnership and that no resource is spent unnecessarily.
- 10. WELCOMES the amendments made on this day to the respective Declarations, and the additional subscription made by Participating States to the related financial envelopes, governing the following Agency programmes:
  - (a) the European participation in the International Space Station Exploitation Programme (ESA/PB-MS/XXIX/Dec.1, rev. 3 (Final));
  - (b) the European Programme for Life and Physical Sciences and Applications in Space ELIPS (ESA/PB-MG/LXX/Dec. 1, rev.5 (Final)).
- 11. NOTES the decisions of the States participating in the ISS Exploitation Programme, which take into account the uncertainties in the assembly and operations of the ISS:
  - (a) to limit their financial commitment in Period 2 to four years (2005-2008), of which the first three years represent a firm commitment and the last year represents a provisional commitment, bearing in mind that a decision on Period 3 will be taken in 2008; and
  - (b) to establish an appropriate mechanism, as detailed in the Annex to this Resolution, by which dedicated decisions by them

## **Cesa Ministerial Council**

76

based on the achievement of specific programme milestones will permit implementation of the programme of activities for 2007 and 2008.

- 12. INVITES the Director General to make arrangements for securing additional flight opportunities for European astronauts, further enhancing the public visibility of the European participation in the ISS Programme and the related scientific and application results, and drawing attention on the educative dimension of that programme.
- 13. INVITES the Director General to report regularly on the progress made in the overall ISS Programme, specifically where it affects the European participation, and in particular for what concerns the achievement of the programme milestones referred to in the Annex.
- 14. EXPRESSES its conviction that the continued international cooperation to build, operate and utilise the ISS marks a major advance in the peaceful collaboration among space-faring nations, and that all Partners must abide by the obligations they have assumed under the IGA and ISS MOUs.

#### **ANNEX**

#### Special Provisions Applicable to the Implementation of the ISS Exploitation Programme Period 2 (2005-2008)

- 1. Within the subscribed financial envelope for Period 2 of 649.7 MEuro at 2006 e.c., an amount of 349.3 MEuro, composed of 169.4 MEuro within the firm financial sub-envelope (2005-2007) and 179.9 MEuro corresponding to the provisional sub-envelope (2008), is blocked.
- 2. The unblocking of specified amounts will be done through dedicated decisions of the participating States concerned, taken in the relevant Programme Board or at Council following achievement of the milestones referred to below and on the basis of a report drawn up by the Director General, on the understanding that such decisions shall require a two-thirds majority vote representing at least two-thirds of the contributions in the programme. Specifically, the decision to unblock:
  - the above-mentioned amount of 169.4 MEuro, in principle by October 2006, is related to (i) the successful second return-to-flight mission of the Space Shuttle, and (ii) the confirmation that the launch of the Columbus laboratory shall occur prior to the end of 2008 (expected at a meeting of the Heads of the ISS Cooperating Agencies in 2006); and
  - the above-mentioned amount of 179.9 MEuro, in principle by October 2007, is related to: (i) the successful docking of the first ATV (Jules Verne), currently planned for May 2007, and (ii) the re-confirmation of the launch of the Columbus laboratory prior to the end of 2008; successful docking of the first ATV shall also authorise the Agency to initiate the integration of ATV-2 and the procurement of ATV-3.