REPORT

on the annual accounts of the ARTEMIS Joint Undertaking for the financial year 2013, together with the Joint Undertaking's replies

(2014/C 452/02)

CONTENTS

	Paragraph	Page
Introduction	1-5	9
Information in support of the statement of assurance	6	9
Statement of assurance	7-18	9
Opinion on the reliability of the accounts	12	10
Basis for a qualified opinion on the legality and regularity of the transactions underlying the accounts	13-16	11
Qualified opinion on the legality and regularity of the transactions underlying the accounts	17	11
Comments on budgetary and financial management	19-22	11
Implementation of the budget	19-21	11
Calls for proposals	22	12
Other matters	23-33	12
Legal framework	23	12
Internal audit function and the Commission's Internal Audit Service	24-27	12
Monitoring and reporting of research results	28	12
Conflicts of interest	29-30	13
The Commission's Second Interim Evaluation	31-32	13
Follow-up of previous observations	33	13

INTRODUCTION

- 1. The ARTEMIS Joint Undertaking, located in Brussels, was set up in December 2007 (1) for a period of ten years and has worked autonomously since 2009.
- 2. The main objective of the Joint Undertaking is to define and implement a 'research agenda' for the development of key technologies for embedded computing systems across different application areas, in order to strengthen European competitiveness and sustainability and allow the emergence of new markets and societal applications (²).
- 3. The founding members of the ARTEMIS Joint Undertaking were the European Union, represented by the Commission, certain EU Member States (Belgium, Denmark, Germany, Estonia, Ireland, Greece, Spain, France, Italy, Hungary, the Netherlands, Austria, Portugal, Romania, Slovenia, Finland, Sweden and the United Kingdom) and ARTEMIS-IA, an association representing companies and other research organisations active in the field of embedded computing systems in Europe. In 2009, the Czech Republic, Cyprus, Latvia and Norway also became members of the Joint Undertaking, and Poland followed suit in 2012.
- 4. The maximum EU contribution to the Joint Undertaking, to cover running costs and research activities, is 420 million euro to be paid from the budget of the Seventh Framework Programme (3). In addition, ARTEMIS-IA is to make a maximum contribution of 30 million euro to the running costs, while the ARTEMIS Member States are to make in-kind contributions to the running costs (by facilitating the implementation of projects) and provide financial contributions of at least 1,8 times the EU contribution. In-kind contributions are also to be provided by the research organisations participating in projects.
- 5. The ARTEMIS and ENIAC Joint Undertakings (4) were merged to create the Electronic Components and Systems for European Leadership Joint Technology Initiative (ECSEL JTI) (5). In addition to combining the ARTEMIS initiative on embedded systems and the ENIAC initiative on nano-electronics, ECSEL JTI will incorporate research and innovation on smart systems. ECSEL JTI started in June 2014 and will run for 10 years. Nevertheless, this report has been produced on a going-concern principle.

INFORMATION IN SUPPORT OF THE STATEMENT OF ASSURANCE

6. The audit approach taken by the Court comprises analytical audit procedures, testing of transactions at the level of the Joint Undertaking and an assessment of key controls of the supervisory and control systems. This is supplemented by evidence provided by the work of other auditors (where relevant) and an analysis of management representations.

STATEMENT OF ASSURANCE

- 7. Pursuant to the provisions of Article 287 of the Treaty on the Functioning of the European Union (TFEU), the Court has audited:
- (a) the annual accounts of the ARTEMIS Joint Undertaking, which comprise the financial statements (⁶) and the reports on the implementation of the budget (⁷) for the financial year ended 31 December 2013; and
- (b) the legality and regularity of the transactions underlying those accounts.

(2) The Annex summarises the Joint Undertaking's competences and activities. It is presented for information purposes.

(4) The ENIAC Joint Undertaking was set up by Council Regulation (EC) No 72/2008 of 20 December 2007 (OJ L 30, 4.2.2008, p. 21) to define and implement a 'research agenda' for the development of key competences for nanoelectronics.

(5) The ECSEL Joint Undertaking was set up by Council Regulation (EU) No 561/2014 of 6 May 2014 (OJ L 169, 7.6.2014, p. 152).

⁽¹⁾ Council Regulation (EC) No 74/2008 of 20 December 2007 on the establishment of the ARTEMIS Joint Undertaking to implement a Joint Technology Initiative in Embedded Computing Systems (OJ L 30, 4.2.2008, p. 52).

⁽³⁾ The Seventh Framework Programme, adopted by Decision No 1982/2006/EC of the European Parliament and of the Council (OJ L 412, 30.12.2006, p. 1), brings all the research-related EU initiatives together under one roof and plays a crucial role in achieving the goals of growth, competitiveness and employment. It is also a key pillar for the European Research Area.

⁽⁶⁾ These include the balance sheet and the economic outturn account, the cash-flow table, the statement of changes in net assets, a summary of the significant accounting policies and other explanatory notes.

⁽⁷⁾ These comprise the reports on implementation of the budget, a summary of budgetary principles and other explanatory notes.

The management's responsibility

- 8. In accordance with Articles 33 and 43 of Commission Regulation (EC, Euratom) No 2343/2002 (⁸), the management is responsible for the preparation and fair presentation of the annual accounts of the Joint Undertaking and the legality and regularity of the underlying transactions.
- (a) The management's responsibilities in respect of the Joint Undertaking's annual accounts include designing, implementing and maintaining an internal control system relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error, selecting and applying appropriate accounting policies on the basis of the accounting rules adopted by the Commission's accounting officer (9), and making accounting estimates that are reasonable in the circumstances. The Director approves the annual accounts of the Joint Undertaking after its accounting officer has prepared them on the basis of all available information and established a note to accompany the accounts in which he declares, *inter alia*, that he has reasonable assurance that they present a true and fair view of the financial position of the Joint Undertaking in all material respects.
- (b) The management's responsibilities in respect of the legality and regularity of the underlying transactions and compliance with the principle of sound financial management consist of designing, implementing and maintaining an effective and efficient internal control system comprising adequate supervision and appropriate measures to prevent irregularities and fraud and, if necessary, legal proceedings to recover funds wrongly paid or used.

The auditor's responsibility

- 9. The Court's responsibility is, on the basis of its audit, to provide the European Parliament and the Council (¹⁰) with a statement of assurance as to the reliability of the annual accounts and the legality and regularity of the underlying transactions. The Court conducts its audit in accordance with the IFAC International Standards on Auditing and Codes of Ethics and the INTOSAI International Standards of Supreme Audit Institutions. These standards require the Court to plan and perform the audit to obtain reasonable assurance as to whether the annual accounts of the Joint Undertaking are free from material misstatement and the underlying transactions are legal and regular.
- 10. The audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the accounts and the legality and regularity of the underlying transactions. The procedures selected depend on the auditor's judgement, which is based on an assessment of the risks of material misstatement of the accounts and material non-compliance by the underlying transactions with the requirements in the legal framework of the European Union, whether due to fraud or error. In assessing these risks, the auditor considers any internal controls relevant to the preparation and fair presentation of the accounts, as well as the supervisory and control systems that are implemented to ensure the legality and regularity of underlying transactions, and designs audit procedures that are appropriate in the circumstances. The audit also entails evaluating the appropriateness of accounting policies, the reasonableness of accounting estimates and the overall presentation of the accounts.
- 11. The Court considers that the audit evidence obtained is sufficient and appropriate to provide a basis for its statement of assurance.

Opinion on the reliability of the accounts

12. In the Court's opinion, the Joint Undertaking's annual accounts present fairly, in all material respects, its financial position as at 31 December 2013 and the results of its operations and its cash flows for the year then ended, in accordance with the provisions of its financial rules and the accounting rules adopted by the Commission's accounting officer.

(⁸) OJ L 357, 31.12.2002, p. 72.

(10) Article 185(2) of Council Regulation (EC, Euratom) No 1605/2002 (OJ L 248, 16.9.2002, p. 1).

^(*) The accounting rules adopted by the Commission's accounting officer are derived from the International Public Sector Accounting Standards (IPSAS) issued by the International Federation of Accountants or, where relevant, the International Accounting Standards (IAS)/International Financial Reporting Standards (IFRS) issued by the International Accounting Standards Board.

Basis for a qualified opinion on the legality and regularity of the transactions underlying the accounts

- 13. The Joint Undertaking's *ex post* audit strategy (11), adopted by a Governing Board decision on 25 November 2010 and modified on 20 February 2013, is a key tool (12) for assessing the legality and regularity of the underlying transactions. The payments made in 2013 relating to certificates of acceptance of costs issued by the national funding authorities of the Member States (NFAs) amounted to 11,7 million euro, or 57 % of the total operational payments.
- 14. Although the audit of project cost claims has been delegated to the NFAs, the administrative agreements signed with the NFAs do not include practical arrangements for *ex post* audits.
- 15. The Joint Undertaking received audit reports from the NFAs covering approximately 46 % of the costs related to completed projects. However, the Joint Undertaking did not assess the quality of these audits. Moreover, by the end of March 2014, the Joint Undertaking had not received information on the audit strategies of seven of the 23 NFAs. It was therefore not in a position to assess whether *ex post* audits provide sufficient assurance as to the legality and regularity of the underlying transactions (13).
- 16. The information available on the implementation of the Joint Undertaking's *ex post* audit strategy is not sufficient for the Court to conclude whether this key control is functioning effectively.

Qualified opinion on the legality and regularity of the transactions underlying the accounts

- 17. In the Court's opinion, except for the possible effects of the matter described in the basis for a qualified opinion in paragraphs 13 to 16, the transactions underlying the annual accounts for the year ended 31 December 2013 are, in all material respects, legal and regular.
- 18. The comments which follow do not call the Court's opinions into question.

COMMENTS ON BUDGETARY AND FINANCIAL MANAGEMENT

Implementation of the budget

- 19. The initial 2013 budget included commitment appropriations amounting to 68,9 million euro. At the end of the year the Governing Board adopted an amending budget reducing commitment appropriations to 32,6 million euro. While the utilisation rate for operational commitment appropriations was 99,4% (after the reduction), the rate for payment appropriations was only 69%.
- 20. The programme manager's budget implementation estimates for the end of 2013 and the actual payments under the different calls were as follows (in percentage):

	Yearly calls for proposals					
	2008	2009	2010	2011	2012	2013
JU estimates for budget implementation at the end of 2013	100 %	100 %	82,5 %	49,6 %	14,6 %	nil

⁽¹¹⁾ The general financing agreement between the European Commission and the Joint Undertaking states that 'the Joint Undertaking, in its competent board, adopts its *ex post* audit strategy with the aim of providing reasonable assurance on the legality and regularity of the underlying transactions' and 'the *ex post* audit strategy shall be based on examination of procedures and of a sample of transactions for all or a sample of beneficiaries and shall, in particular, adequately reflect the risks involved'.

⁽¹²⁾ Article 12 of Regulation (EC) No 74/2008 states that 'The ARTEMIS Joint Undertaking shall ensure that the financial interests of its members are adequately protected by carrying out or commissioning appropriate internal and external controls' and 'The ARTEMIS Joint Undertaking shall carry out on-the-spot checks and financial audits among the recipients of the ARTEMIS Joint Undertaking's public funding. These checks and audits shall be performed either directly by the ARTEMIS Joint Undertaking or by ARTEMIS Member States on its behalf. ARTEMIS Member States may carry out any other checks and audits among the recipients of their national funding as they deem necessary and shall communicate the results to the ARTEMIS Joint Undertaking.'

⁽¹³⁾ According to the *ex post* audit strategy adopted by the ARTEMIS Governing Board, the Joint Undertaking must assess at least once a year whether the information received from the ARTEMIS Member States provides sufficient assurance as to the regularity and legality of the executed transactions.

	Yearly calls for proposals					
	2008	2009	2010	2011	2012	2013
Actual payments made at the end of 2013	79 %	63 %	49 %	34 %	10 %	nil

21. The low budget implementation rate is mainly due to the lengthy and complex process for the financial closure of projects.

Calls for proposals

22. The Council Regulation setting up the Joint Undertaking envisaged a maximum total budget of 410 million euro to cover operational expenditure. The current amount of appropriations committed for the calls for proposals accounts for 201 million euro, or 49 % of the total budget.

OTHER MATTERS

Legal framework

23. The new Financial Regulation applicable to the general budget of the Union (¹⁴) was adopted on 25 October 2012 and took effect on 1 January 2013 (¹⁵). However the model financial regulation for public-private partnership bodies referred to in Article 209 of the new Financial Regulation did not enter into force until 8 February 2014 (¹⁶). Because of the merger into ECSEL Joint Undertaking, the financial rules of the Joint Undertaking have not been amended to reflect these changes.

Internal audit function and the Commission's Internal Audit Service

- 24. Article 6.2 of the Council Regulation setting up the ARTEMIS Joint Undertaking stipulates that the Joint Undertaking shall have an internal audit capability. However, as at the end of 2013, this had not been set up.
- 25. The mission charter of the Commission's Internal Audit Service (IAS) was adopted by the Governing Board on 25 November 2010. However, the financial rules of the Joint Undertaking have not been amended to include the provision of the Framework Regulation referring to the powers of the Commission's Internal Auditor.
- 26. In 2013, the IAS audited the adequacy and effectiveness of ARTEMIS' internal control system with regard to the management of experts. The audit concluded that the current internal control system provides reasonable assurance regarding the achievement of the business objectives set up by ARTEMIS for the management of experts. It also made several important recommendations regarding the adoption of a comprehensive confidentiality policy, the sensitivity of the programme officer's post and the rules for allocation of workload for the remote evaluators.
- 27. The ARTEMIS, Clean Sky, ENIAC, FCH and IMI Joint Undertakings, were the subject of an IT risk assessment by the IAS of their shared IT infrastructures (17).

Monitoring and reporting of research results

28. The Seventh Framework Programme (FP7) Decision (¹⁸) establishes a monitoring and reporting system related to the protection, dissemination and transfer of research results. The Joint Undertaking has developed procedures to monitor the protection and dissemination of research results at different project stages, but this monitoring requires further development to fully meet the provisions of the Decision (¹⁹).

(15) Article 214 of Regulation No 966/2012 with the exemptions referred to.

(17) The final report dated 22 November 2013 noted the need to formalise IT security policy and include detailed procedures/controls in future contracts with IT service providers.

(19) See the observation referring to the integration of results achieved in research projects into the Commission communication and dissemination system, included in the 2012 Annual Progress Report from the Commission to the European Parliament and the Council on the activities of the Joint Technology Initiative Joint Undertakings, (SWD (2013) 539 final).

⁽¹⁴⁾ Regulation (EU, Euratom) No 966/2012 of the European Parliament and of the Council of 25 October 2012 on the financial rules applicable to the general budget of the Union and repealing Council Regulation (EC, Euratom) No 1605/2002 (OJ L 298, 26.10.2012, p. 1).

⁽¹⁶⁾ Commission Delegated Regulation (EU) No 110/2014 of 30 September 2013 on the model financial regulation for public-private partnership bodies referred to in Article 209 of Regulation (EU, Euratom) No 966/2012 of the European Parliament and of the Council (OJ L 38, 7.2.2014, p. 2).

⁽¹⁸⁾ Article 7 of Decision No 1982/2006/EC of the European Parliament and the Council of 18 December 2006 concerning the Seventh Framework Programme of the European Community for research, technological development and demonstration activities (2007-2013) states that the Commission shall continually and systematically monitor the implementation of the Seventh Framework Programme and its specific programmes and regularly report and disseminate the results of this monitoring.

Conflicts of interest

- 29. The Joint Undertaking does not have a comprehensive written procedure to deal with conflicts of interest.
- 30. There is a need for a clear definition of what should be considered a conflict of interest, a database regularly updated to include all information related to conflicts of interest, a procedure for managing them and a mechanism for dealing with breaches of the policy.

The Commission's Second Interim Evaluation (20)

- 31. The Commission's Second Interim Evaluation, carried out from September 2012 to February 2013, assessed the ARTEMIS and ENIAC Joint Undertakings in terms of relevance, effectiveness, efficiency and research quality.
- 32. The report was issued in May 2013 and contained several recommendations to the ARTEMIS Joint Undertaking, in particular regarding the efficiency of project reviews, measures to be taken to improve the match of the project portfolio to strategic European aims, and the appropriate metrics for measuring the impact and success of ARTEMIS projects.

Follow-up of previous observations

33. The Disaster Recovery Plan for the Joint Undertakings for the common IT infrastructure has not yet been approved. In the meantime, the ARTEMIS Joint Undertaking has adopted measures at its own level in order to deal with emergency situations.

This Report was adopted by Chamber IV, headed by Mr Milan Martin CVIKL, Member of the Court of Auditors, in Luxembourg at its meeting of 21 October 2014.

For the Court of Auditors

Vítor Manuel da SILVA CALDEIRA

President

ANNEX

ARTEMIS Joint Undertaking (Brussels)

Competences and activities

Areas of Union competence deriving from the Treaty

(Articles 187and 188 of the Treaty on the Functioning of the European Union) Decision No 1982/2006/EC of the European Parliament and of the Council of 18 December 2006 concerning the Seventh Framework Programme provides for a Community contribution to the establishment of long-term public-private partnerships in the form of Joint Technology Initiatives which could be implemented through Joint Undertakings within the meaning of Article 187 of the Treaty.

Council Regulation (EC) No 74/2008 of 20 December 2007 on the establishment of the 'ARTEMIS Joint Undertaking' to implement a Joint Technology Initiative.

Competences of the Joint Undertaking

(Council Regulation (EC) No 74/2008)

Objectives

- The Joint Undertaking shall contribute to the implementation of the Seventh Framework Programme by defining and implementing significant parts of the AREMIS Strategic Research Agenda for the development of key technologies in the field of embedded computing systems, by creating a sustainable public-private partnership and leveraging and increasing private and public investment in the sector of embedded systems in Europe.
- The JU aims to achieve effective coordination and synergy of resources and funding from the industry, the Framework Programme, national R & D programmes and intergovernmental R & D schemes, thus contributing to strengthening Europe's future growth, competitiveness and sustainable development.
- ARTEMIS seeks to foster collaboration between all stakeholders such as industry, including small and medium-sized enterprises (SMEs), national or regional authorities, academic and research centres, pulling together and focusing the research effort.
- The JU adopts a commonly agreed research agenda closely following the recommendations of the Strategic Research Agenda developed by the ARTEMIS Technology Platform. This Research Agenda identifies and regularly reviews research priorities for the development and adoption of key technologies for embedded computing systems across different application areas in order to strengthen European competitiveness and allow the emergence of new markets and applications important to society.
- The JU will support R & D activities through open and competitive calls for proposals published on a yearly basis, to attract the best European research ideas and capacities in the field of embedded computing systems. Proposals submitted to ARTEMIS JU calls undergo a technical evaluation and selection process carried out with the assistance of independent experts. This process ensures that allocation of the Joint Undertaking's public funding follows the principles of equal treatment, excellence and competition.

Governance

The JU's governing body is the Governing Board. The executive team is led by an Executive Director, while industry (which includes large and small enterprises, as well as academia and research institutes) is represented by the ARTEMIS Industry Association (ARTEMIS-IA). ARTEMIS-IA provides the chairperson of the Governing Board and the members of the Industry and Research Committee (IRC), which is responsible for the technical work programme. The public sector (participating Member States and the European Commission) are individually represented on the Governing Board and the Public Authorities Board (PAB), which is responsible for financial matters.

Resources available to the	Budget				
Joint Undertaking in 2013	30 343 708 euro for commitments.				
	30 000 000 euro for payments (operational).				
	Staff at 31 December 2013				
	15 posts provided for in the establishment plan (8 temporary staff and 7 contract staff); 13 posts were occupied and assigned as follows: operational activities (8); administrative tasks (5); mixed tasks (0).				
Activities and services provided in 2013	See the Joint Undertaking's annual activity report for 2013 at http://www.artemis-ju.eu/reference_documents				

Source: Information supplied by the ARTEMIS Joint Undertaking.

THE JOINT UNDERTAKING'S REPLIES

- 14. 15. 16. ARTEMIS submits a common action plan with ENIAC to mitigate this qualified opinion:
- 1. Visit to National Funding Authorities (NFA): visits took place already in Germany, Belgium and France, followed by additional documentation; the assessment reports are in the process of being elaborated. The results so far are as follows:
 - Germany (15,9 % of the EU grants in ARTEMIS): well documented system, with sharp separation of responsibilities and multiple levels of control. Germany gains assurance by using an ex post 'in-depth verification' procedure applied at the end of the indirect action. According to our preliminary assessment, the ex post 'in-depth verification' procedure corresponds to the international standards. In 2013, this procedure has been applied to a sample of 120 operations out of the total of 424 operations (28,3 %) resulting in an error rate of less than 1 %. Ongoing activities: a few aspects of the procedure are in the process of being clarified before a final conclusion on the assessment, we engaged in a discussion with regard to the exchange on the sampling information that would allow the results to be consolidated with similar results from other countries. This shall be concluded before the end of 2014
 - Belgium (3,25 % of the EU grants in ARTEMIS): well documented procedure, with clear separation of responsibilities and multiple levels of control. Belgium gains assurance by using an 'in-depth verification' procedure applied at the end of the indirect action. According to our assessment, this procedure shall generate a level of assurance equivalent with the audits executed in line with the prevailing international standards. Belgium submits all ARTEMIS and ENIAC projects (100 %) to an ex ante 'in-depth verification', prior to executing the final payments. Belgium performs ex post audits only with respect to procedures, in order to improve the system. Consequently, the assurance system does not yield any residual error rate (or it can be considered that the error rate is zero).
 - France (9,93% of the EU grants in ARTEMIS): the system relied on 100% verifications for all actions started before 2011, when France introduced a more resource-efficient system with clear separation of responsibilities and multiple levels of control based on statistical *ex post* audits. According to our preliminary assessment, the *ex post* 'indepth verification' procedure corresponds to international standards. France will gain assurance by using an *ex post* auditing procedure applied at the end of the indirect action. The first actions started under the new system will approach closure in 2015, therefore France could not provide statistical information yet.

Further exchanges are planned with the Netherlands (13,86 % of the EU grants in ARTEMIS) and Austria (8,11 % of the EU grants in ARTEMIS).

- 2. The auditee invited the auditing authorities in the ARTEMIS/ENIAC Member States, the European Commission auditors and the European Court of Auditors, to a workshop that took place on 1 October 2014, to present their systems for gaining assurance and exchange best practices, in an effort to stimulate convergence and define procedures compatible with the national systems.
- 29. 30. We thank the Court for raising this point and it will be addressed in the procedures of the ECSEL Joint Undertaking