Developing the European EO Services Industry

Geoff Sawyer: EARSC Secretary General

What is EARSC?

EARSC is a trade association (NGO), founded in 1989, which represents companies: offering and undertaking consulting and other services or supplying equipment in the field of remote sensing.

Our mission is

- o to foster the development of the European Geo-Information Service Industry

We represent European geo-information providers creating a sustainable network between industry, decision makers and users
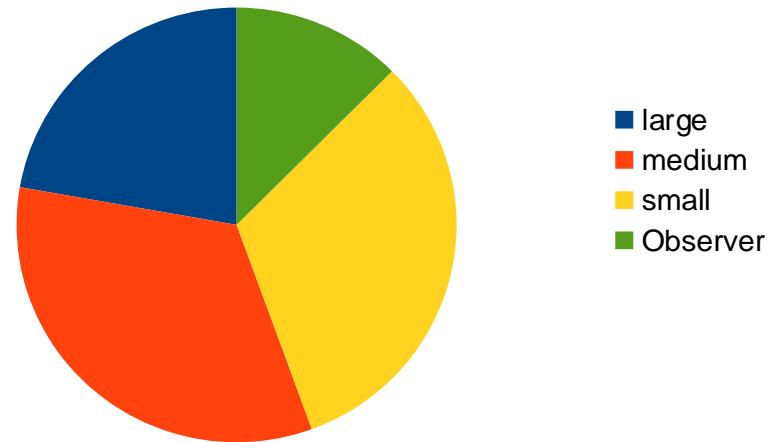
Our focus is on remote sensing from space-based platforms (satellites) but we also have members which are aircraft operators.

EARSC composition

EARSC has 72 Members

o Large: 16 companies

o Medium: 24 companies

o Small: 23 companies

o Observers: 9 organization

large
medium
small
Observer

From 23 countries [germany (9), uk (9), france (7), italy (7), belgium (6), netherlands (6),spain (5), norway (4), bulgaria (3), austria (2), poland (2), sweden (2), austria (2), portugal (1), luxemburg (1), czech republic (1), denmark (1), lithuanian (1), greece (1), romania (1), russia (1), slovakia (1), ukraine (1)]

What does EARSC do?

o Provide information to our members on programmes, policy and the sector; (business intelligence)

o Maintain a knowledge of the industry ie statistics, market information etc.

o Promote professional standards within the industry

o Promote the industry and it's capabilities by:

  o Linking communities: between EO services sector and other business sectors eg oil & gas, insurance as well as public institutions e.g world bank

  o Organising events offering networking opportunities as well as focused information; including finding research partners.

  o Advocacy towards policy makers on issues of concern

Focus is on enabling development of new business

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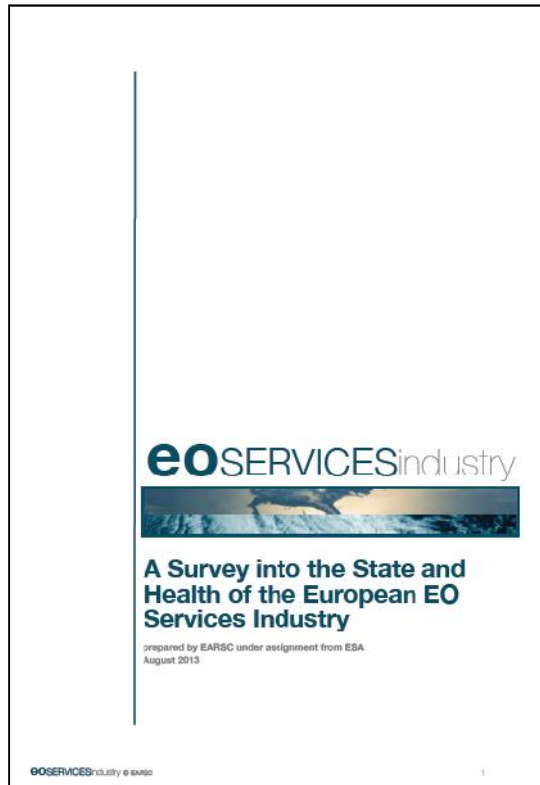of Remote Sensing
Companies

Market Development Challenges

- Raising Awareness: consistent problem, customers are aware of EO satellite observations but not how it can be applied to their problems.

  - applies to commercial and public (potential and actual) customers

  - perception as an expensive tool

- SME's : lack resources to develop new opportunities, especially difficult in export

- Public-private : EO domain is very complex. Both public and private suppliers and customers.

  - need to work in partnership

European EO Services Industry

eoSERVICES industry

A Survey into the State and Health of the European EO Services Industry

prepared by EARSC under assignment from ESA
August 2013

- Offers a full range of services based on extensive experience serving government, industry and the citizen

- Includes data providers, downstream service providers, software and consultancy companies with a mastery of space-borne/airborne/in-situ systems and sensors technologies.

- Innovative / dynamic; many new companies, changing ownership

- Over 300 companies largely SME's with:

  - strong partnership experience across European borders.

  - a highly skilled workforce; interchange with other sectors

  - Full industry survey has been made by EARSC and published in September 2013.

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EARSC Space4you Bari – February 2014

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EO Services Industry Sector Profile
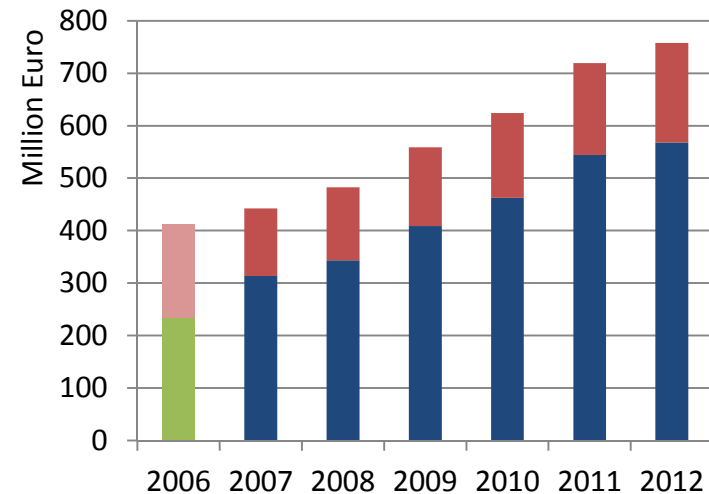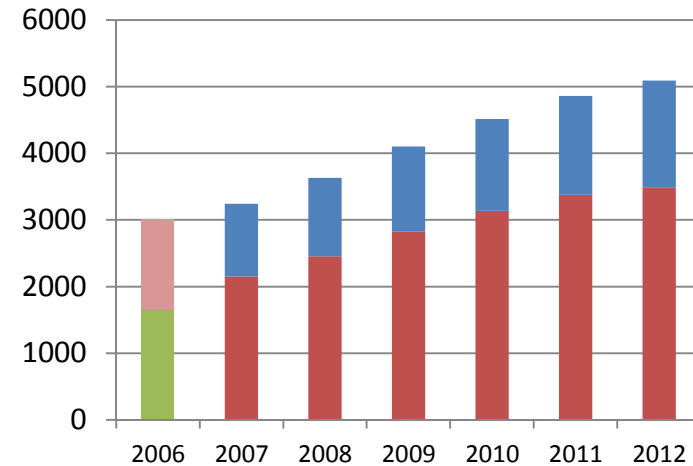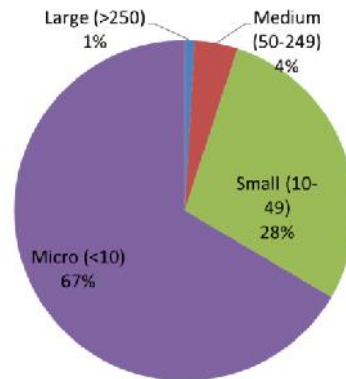
Key Facts
From EARSC 2013 Industry Survey

319 = Number of companies in Europe and Canada in 2012

5087 = Total number of employees in 2012

€757m = Total Revenues for the sector in 2012

67% = Proportion of companies with less than 10 EO employees: 95% with less than 50 employees

Pie chart:
- Large (>250) 1%
- Medium (50-249) 4%
- Small (10-49) 28%
- Micro (<10) 67%

Bar chart (top): values 0–6000, years 2006–2012

Bar chart (bottom): Million Euro, values 0–800, years 2006–2012

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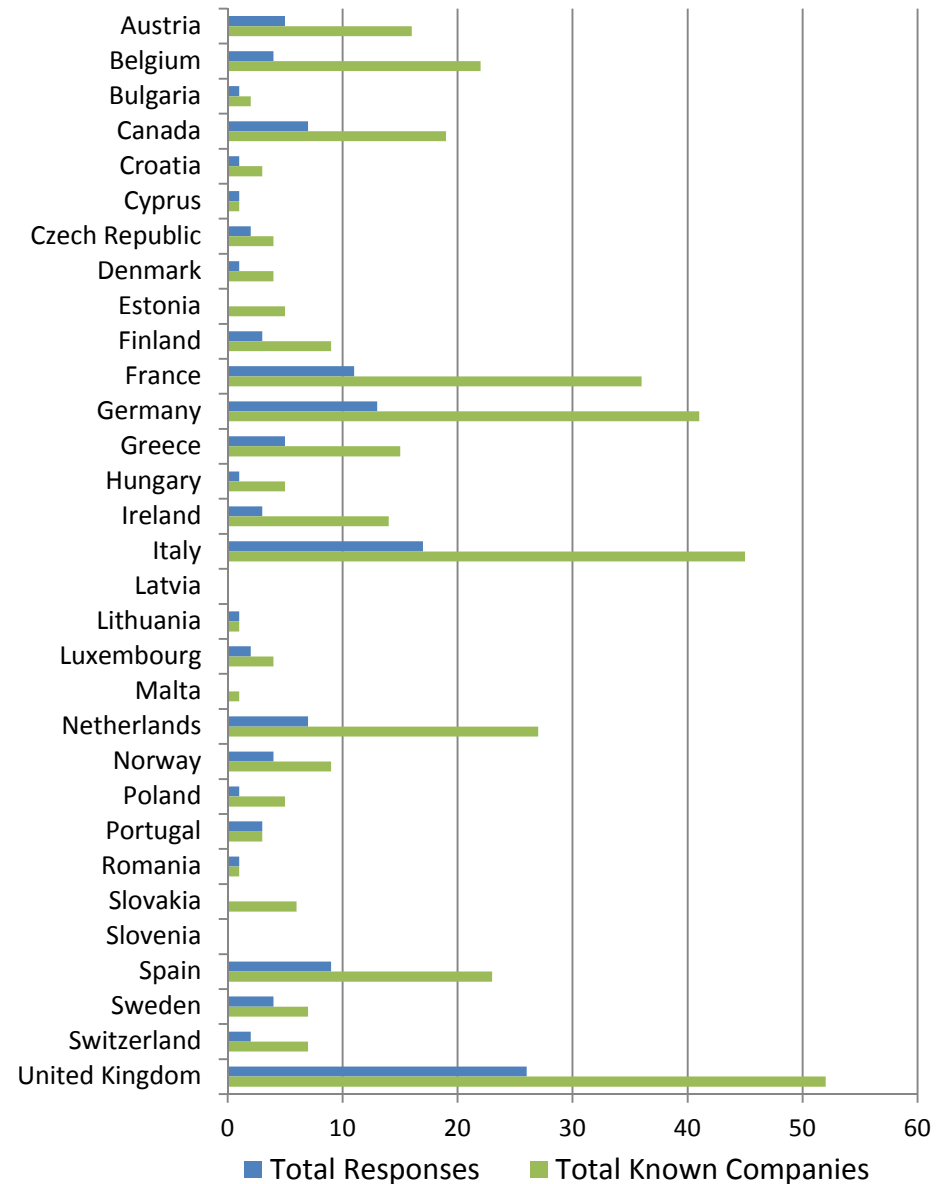European Association of Remote Sensing Companies

Company Location

UK holds the most companies followed by Italy, Germany, France, Netherlands and Spain.

Growth in number in the UK has continued; first visible in UK between 2004 and 2006.

At least 1 company in almost every EU member state.

Copernicus is likely to stimulate continued growth in all MS as regional interest is strong.

Legend: ■ Total Responses ■ Total Known Companies

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EO Services - An innovative sector

Vision

- The EO services domain is dominated by a large number of very small companies.

- Copernicus will be a strong vector for growth in the sector

- Delivery of services to regions will be a key goal coming from Copernicus.

- It is a ripe environment for developing new companies in the regions throughout Europe.

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Copernicus – Key market enabler

- Copernicus is a key European public programme to provide space-derived information on environment and security to European policy makers and citizens.

- Direct funding for EO services is important and will develop new products to be exploited
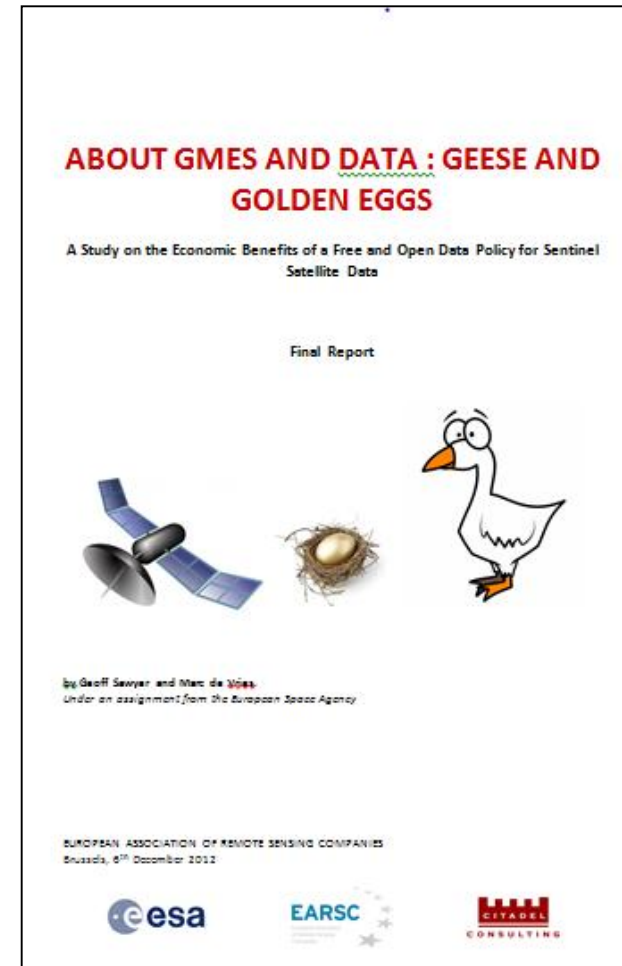
But more important:

- Copernicus provides a strong opportunity as a market driver for EO Services.

  - Industry can exploit opportunities using Copernicus products & services in other markets eg. commercial, export and non-EU government.

  - with an EU customer base to provide a reference.

- In 2014, the first of the Copernicus Sentinel satellites will be launched generating Terrabytes of data every day.

- It can be a source of golden eggs creating new tax revenues and jobs.

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Why should the data be free?
PSI = Public Sector Information

- The principle of PSI Re-use is very simple; the practice is quite complex!

  - PSI is fungible and non-rivalrous: it is can be reproduced at very low cost and in many copies without any constraints.

  - PSI is information gathered by governments as part of their responsibility towards the citizen. Hence; it has been paid for out of tax revenues; why should citizens pay for it a second time?

- BUT There are practical considerations to making it available for re-use:

  - Security of the information whether due to national security concerns or due to personal nature of information

  - Investments made in systems or organisations need to be recognised and the transition managed

ABOUT GMES AND DATA : GEESE AND GOLDEN EGGS

A Study on the Economic Benefits of a Free and Open Data Policy for Sentinel Satellite Data

Final Report

by Geoff Sawyer and Marc de Vries.
Under an assignment from the European Space Agency

EUROPEAN ASSOCIATION OF REMOTE SENSING COMPANIES
Brussels, 6th December 2012

eesa   EARSC   CITADEL CONSULTING

Copernicus Services

Now it seems assured that there will be a free and open data policy for the data coming from Sentinel satellites

Industry concerns now focus on the procurement of the services and the role that industry will play.

Economic value can be created in two ways; both recognised in the Copernicus regulation:

1. Copernicus services which improve the efficiency and promote growth across all societal areas

2. Stimulate growth in the supply industry and especially the downstream sector for EO services

Procuring the Services

Services may be provided by either or both Public Sector Bodies (PSB) or by private industry.

1. Services will be run by PSB's with delegated budgetary authority. The PSB will need technical competence in the service area concerned to validate and manage service quality.

2. Services should be delivered to the <u>maximum extent possible</u> by the private sector which is the only vector for delivering economic benefit in the downstream sector

3. Will stimulate a network of small companies meeting local / regional information needs.

How can we assure that this vision is met?

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Linking Communities - OGEO

OGEO Portal

- Provides a link with the Oil & Gas Industry
- Offers a forum for exchanging information
- Guidance on EO applications
- Success Stories eg real benefits from EO.
- Industry status eg certification & standards
- Knowledge management e.g documents, meetings etc

Linking Communities – IFI's

EO Portal

- Provides generic tool for linking with other communities
- Eg. IFI's such as WB and ADB
- Present organised information relevant to each body
- All information on EO services common to all communities
- In process of stepping out towards the ADB

Linking Communities - Research

Research Corner

Provides virtual networking and meeting facilities to form R&D (H2020) teams:

- Chat & exchange with other users
- Library of relevant documents
- Advertise partners search
- Book a private meeting room for a project team
- Learn about programmes with guidance and analysis

Linking Communities – The Future

We are successfully putting in place the foundations to establish links between the EO Service Providers and other key Communities: What next?

- ADB: Extend the information provided and examples given = More content

- OGEO: adding new projects: 4 new projects for O&G industry to be incorporated and run through the Portal

- Research Corner: to become live by June in time for the 2nd call under H2020.

- Regions: extend the portal to regional players to increase awareness and dialogue between and with the EO service providers.

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Regions

Now seems to be the time to revisit links between the EO services industry sector and regional authorities:

- a young and innovative industry sector

- Copernicus will deliver services to the regions

- Many EO services oriented to supporting regional policy objectives.

- Regions look for capacity building and to encourage new businesses

- NEREUS focus on clusters, exports, and EO services are well aligned with EARSC objectives to link research clusters, communities, exports etc

Work together to increase the industrial benefit and the regional economy.

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For more Information

For Information on EARSC:

www.earsc.eu / www.eomag.eu / secretariat@earsc.org

For information on the Industry:

www.eopages.eu

Report on the State and Health of the EO Services Industry

For links to other Communities:

www.ogeo-portal.eu

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