



# Monitoring and making sense of news from all over the world, all the time

European Media Monitor (EMM) is a news gathering engine that monitors the ever-changing content of the live web and its publications, news and discussion sites. It was set up to be used primarily by EU Institutions and their global partners as a means to rapidly identify, interpret and flag both past and breaking news on issues of critical importance. It has now found a host of additional uses.

Currently, EMM is receiving up to 2 million hits and issues 100,000 reports per day, spotlighting 250 countries in over 50 languages. The technology was first developed and patented at the research facilities of the European Commission's in-house science service, the Joint Research Centre (JRC). It has developed multiple new data, image and text mining applications and is being licensed to external partners.

True to its origins, EMM specialises in providing instantaneous and accurate information to front line decision-makers and first responders dealing with global security and crisis management. In particular, those concerned with improving the EU's disaster risk reduction measures and the protection of the EU budget, as well as with enhancing the EU's prevention, preparedness and response capabilities to threats varying from health emergencies and humanitarian disasters to conflict and other risks.



**Joint Research Centre (JRC)**

– the European Commission's in-house science service

What this means: EMM software is groundbreaking. It is uniquely designed to retrieve and interpret information available online. For example, EU services and governmental bodies need to monitor press reports and to research and analyse past events. Law enforcement agencies and counter-terrorism analysts need tools which enable them to mine the Internet and process thousands of documents to identify patterns, establish relationships and produce evidence. Researchers, journalists and individual citizens who follow developments in particular countries or related to particular topics will get the overview and the detailed information they need.

EMM excels especially where alert teams need to respond to the unexpected. It tracks the most reported topics over short and long periods, then groups related news together, and is programmed to issue alerts, for example, of disease outbreaks, as well as natural, industrial and maritime accidents and disasters. This work is both automated and based on the analytical expertise of scientists operating the systems.

At a time of concern about terrorism and increased radicalisation, EMM is capable of monitoring the so-called 'hidden web', that part of the Internet which search engines cannot access. This level of information extraction and analysis is challenging, based as it is on identifying small signals which are precursors to major events such as a terrorist attack or health threat. EMM also offers three publicly accessible news services: NewsBrief, NewsExplorer and MediSys (health issues). Using multilingual word search software, these scan over 3,000 key news portals every 10 minutes and classify results in over 1,000 categories.

Users can opt to see news headlines falling into specific thematic categories. With a link to original articles, users can click their way through the enormous body of information available, filtering the search results as they go by language or content to their own specific needs. These extracted 'facts' are then distilled even further to feed topic-specific news briefings for individuals, their newsletters or Internets. This is impossible to perform manually and replaces tedious and expensive media monitoring services. User-friendly maps show where today's events are happening and over 1 million individuals and organisations are tracked in up to 170 multilingual spelling variants.

## Background

Developed in 2002, EMM was first designed to help European Commission services with daily media monitoring. Its utility as an intelligence support to specific policy fields such as global security and crisis management became evident and led to rapid diversification into customised end-products.

A JRC spin-off, OSVision was created in 2008. Recent developments include: EMLabs (a new service offering data analysis in the form of maps, charts and tables, plus social networking analysis); and JRC-Names: (a technical resource allowing users to find people or organisations via many spelling variants in multiple scripts, or machine translation tools to find the right equivalent of names in different languages).



## Did you know?

Scientists at the Joint Research Centre have used EMM to explore the relation between armed conflict and access to natural resources and other geo-political factors.

**EMM is an example where EU-funded research is staying abreast of, if not leading, world trends in the ICT sector. Its applications are instrumental and numerous EU services, agencies, international organisations and Member State bodies are requesting its involvement. Its distinctive competence is that from finding a needle in a haystack to sifting through vast flows of information, it is a fast and flexible tool, tailored to end-user needs.**