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Abstract:

This document reports all the dissemination and standardization activities realized during the second 6 months of the MONET project, from the 1st July 2010 to the 31st December 2010. Dissemination activities include the realization and the update of the project's website, the participation at international conferences, the publication in conferences, journals and books, the distribution of brochures and leaflets, and the organization of workshops. Standardization activities are focused on the interaction, in terms of monitoring and contribution providing, with standardization bodies for which the work proposed in MONET is relevant.

¹ Nature of deliverable: **R** = Report; **P** = Prototype; **D** = Demonstrator; **O** = Other

² Dissemination level: **PU** = Public; **PP** = Restricted to other programme participants (including the Commission Services); **RE** = Restricted to a group specified by the consortium (including the Commission Services); **CO** = Confidential, only for members of the consortium (including the Commission Services).

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Executive Summary

This document reports all the dissemination and standardisation activities realized during the second 6 months of the MONET project, from the 1st July 2010 to the 31st December 2010.

This document includes:

- A dissemination plan.
- A description of MONET Logo and Website, including the updates carried out during the period of interest, illustrating its features and changes.
- A report on the participation to conferences and other dissemination events.
- A report on the publications of research papers in conferences and journals.
- Standardisation plan and activities carried out up to the 31st December 2010.



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List of Acronyms

Acronym	Meaning
ACM	Association for Computing Machinery
AIAA	American Institute of Aeronautics and Astronautics
AMR	Adaptive Multirate
ATC	Ancillary Terrestrial Component
BPM	Business Process Management
DYMO	Dynamic MANET On-demand Routing
ETSI	European Telecommunications Standards Institute
IEEE	Institute of Electrical and Electronic Engineers
IET	Institution of Engineering and Technology
IETF	The Internet Engineering Task Force
IFAC	International Federation of Automatic Control
ISI	Integrated Satellite Initiative
ITU-T	International Telecommunication Union – Telecommunication Standardization Bureau
MANET	Mobile Ad-hoc Networks
MELPe	Mixed-Excitation Linear Predictive enhanced
MESA	Mobility for Emergency and Safety Applications
MONET	Mechanisms for Optimization of hybrid ad-hoc networks and satellite NETWORKS
OLSR	Optimized Link State Routing
PSC	Public Safety Communication forum
QoE	Quality of Experience
QoS	Quality of Service
SIAM	Society for Industrial and Applied Mathematics
SIP	Session Initiating Protocol
SME	Small and Medium Enterprise
TEDS	TETRA Enhanced Data Service
TETRA	TERrestrial Trunked Radio
UDP	User Datagram Protocol

Table 1 – List of acronyms.

1 Introduction

This document corresponds to the second report on the dissemination and standardisation activities conducted in the context of the MONET project. This report covers the period of the project starting from the 1st July 2010 up to the 31st December 2010, in the context of WP8.

MONET is an FP7 European project centred on hybrid MANET-Satellite networks. Such a typology of network is a natural evolution of considering the problem of providing local and remote connectivity in a highly mobile, dynamic and often remote environment. MONET will study the challenges of such composite networks with particular focus on the following:

- Optimising network resources and link availability;
- Providing Quality of Service (QoS) and Quality of Experience (QoE);
- Minimizing costs and energy.

In the context of the MONET workplan, work package WP8 includes all the activities that aim to provide external visibility to MONET project results, including scientific, technical, commercial and industrial points of view, as well as standardization. Exploitation activities are also part of WP8.

This document is organized in the following way: Section 2 summarizes the structure and the different activities planned for WP8. Section 3 introduces a dissemination plan that should be developed during the duration of the project. Section 4 reports the updates carried out on the MONET web site during the period of interest. Section 5 addresses the organization of workshops, seminars and the participation to conferences and other dissemination events. Section 6 discusses publications of research papers in international conferences and journals. Section 7 reports standardisation activities related to MONET project developed up to the 31st December 2010. Finally, a conclusion section ends this report.

2 WP8 Structure

WP8 – Dissemination, Exploitation and Standards aims at:

- Ensuring an efficient dissemination of the project objectives and results to the stakeholders that are considered critical to the project: stakeholders are the project partners but also the target audiences outside the project; e.g., emergency services, public safety authorities, communities, municipalities, satellite operators and devices/terminals manufacturers.
- Define an exploitation strategy for the project and pursue exploitation activities (e.g. business case, productization, etc.).
- Interface with standardization groups.

Work Package 8 is split into three tasks: Task 8.1, Task 8.2 and Task 8.3.

Regarding Task 8.1, the following activities are planned:

- Development of a dissemination strategy to stimulate project awareness among market and stakeholders.



- Exchange of information with end-users and other projects and initiatives (including EU projects).
- Creation of a website: build, maintain and update a Web Platform, to store and access the knowledge on the project in a user friendly and easily accessible way.
- Publication of the results (electronic based and paper-based dissemination) – Prepare promotional literature to support the marketing strategy, including a project leaflet, articles, newsletters, conference papers, etc.
- Participation in conferences, seminars and workshops.

Task 8.2 is dedicated to activities that target the exploitation of project results and future business opportunities for the partners. The related activities include the development of a business case for MONET, the management of project and partners IPR, a focused and targeted dissemination of the project to specific end-users and potential customers, the development of a product development / research roadmap and the establishment of a plan for using and disseminating the foreground knowledge gained by the project.

Task 8.3 is responsible for the monitoring of the project's activities concerning their relation and potential compliance with existing standards or on-going work in standards. The following activities are foreseen:

- Interact with relevant standardisation groups;
- Provide inputs to them and monitor the project work to ensure we follow the same directions.

3 Dissemination Plan

This section introduces the dissemination plan of MONET project, describing the general actions and strategies to be undertaken in order to ensure an efficient dissemination of project results.

The MONET dissemination policy will be naturally oriented towards the natural end-users of the project results (i.e. public administrations in rural regions, public safety and emergency relief authorities as well as companies with field workforces in isolated areas). These include fire services, forest services, civil protection, humanitarian relief organisations, local municipalities, quarrying companies, building companies and of course the civil and political authorities responsible for decision making. Other groups will also be considered and targeted. These include communication equipment developers and potential partners and customers (e.g. governments, telecommunications operators and wireless providers).

A MONET website, already developed, will be used to boost information flow between all entities with an interest in the project: the Commission, industrial companies, universities, technological centres, standardization bodies, etc. It will also be used to disseminate relevant information to targeted parties, including policy makers. A detailed description is available in D8.1 M6 deliverable at Section 4.2. In this document some updates activities on the web site are reported, in Section 4.

A set of publicity activities (as the realization of MONET logo, brochure, leaflets, other MONET branded materials) have been carried out in order to aid and promote instant public

recognition. The results of these activities are reported In D8.1 M6 MONET deliverable, in particular in Section 4.1 and Section 6. Other dissemination activities foreseen include:

- Presentations at different events targeted to relevant interested parties, for example:
 - AIAA International Communication Satellite Systems Conference and Exhibit;
 - The European PSC (Public Safety Communication) Forum;
 - FP7 ICT Infodays (at European and national levels);
 - International conference on Wireless Networks - ICWN (Worldcomp – every year);
 - Conferences on communications (e.g. IEEE international conference on communications, IEEE Globecom, IEEE Infocom, FP7 ICT Mobile & Communication Summit);
 - Conferences on optimization and control-theory (e.g., IEEE Conference on Decision and Control, IEEE Conference on Control Applications, IFAC World congress, ...);
 - Ad-hoc – NOW (conference held every year);
 - ISI European Technology Platform organized events;
- Presentations and meetings with advisory board candidates or members;
- Writing articles, publications to scientific communications, and optimization and control journals and magazines such as Elsevier's Ad-hoc Networks International Journal, Elsevier's Computer Communications Journal, International Journal of Parallel, emergent and Distributed Systems, Wiley's International Journal of Satellite Communications and Networking, Springer's Journal Mobile Networks and Applications, IEEE/ACM Transactions on Networking, IEEE Transactions on Wireless Communications, IEEE Communications Magazine, IEEE Wireless communications magazine, IET Communications, IEEE Transactions on Communications, IEEE Journal on Selected Areas on Communications (JSAC), IEEE Transaction on Automatic Control, International journals of satellite communications and networks, Computer Networks (Elsevier), Automatica (Elsevier), Control Engineering Practice (Elsevier), SIAM Journal on Optimization, SIAM Journal on Control and Optimization, European Journal of Control (Lavoisier), and the International Journal of Control (Taylor & Francis).

Section 6 shows publications related to MONET that have been carried out during the period of interest and Section 5 illustrates the conferences/workshops/seminars organized and attended to disseminate project concept and results.

Finally, MONET will also disseminate knowledge directly to the relevant European Technology Platforms, contributing to updates in their strategic research agendas (ISI and e-Mobility). These activities will be instrumental in increasing the awareness of opportunities and advantages raised by MONET (both its use and research).

4 MONET Website updates

The MONET website, through which general information on MONET is made available, plays a major role in the dissemination of the project activities and results. It has been realized as a

Google site and is available both at the url: <http://www.ict-monet.eu> and at the url <http://sites.google.com/a/tekever.com/monet/>. The website of MONET has been launched in May of 2010, and its homepage is reported here in the following figure.

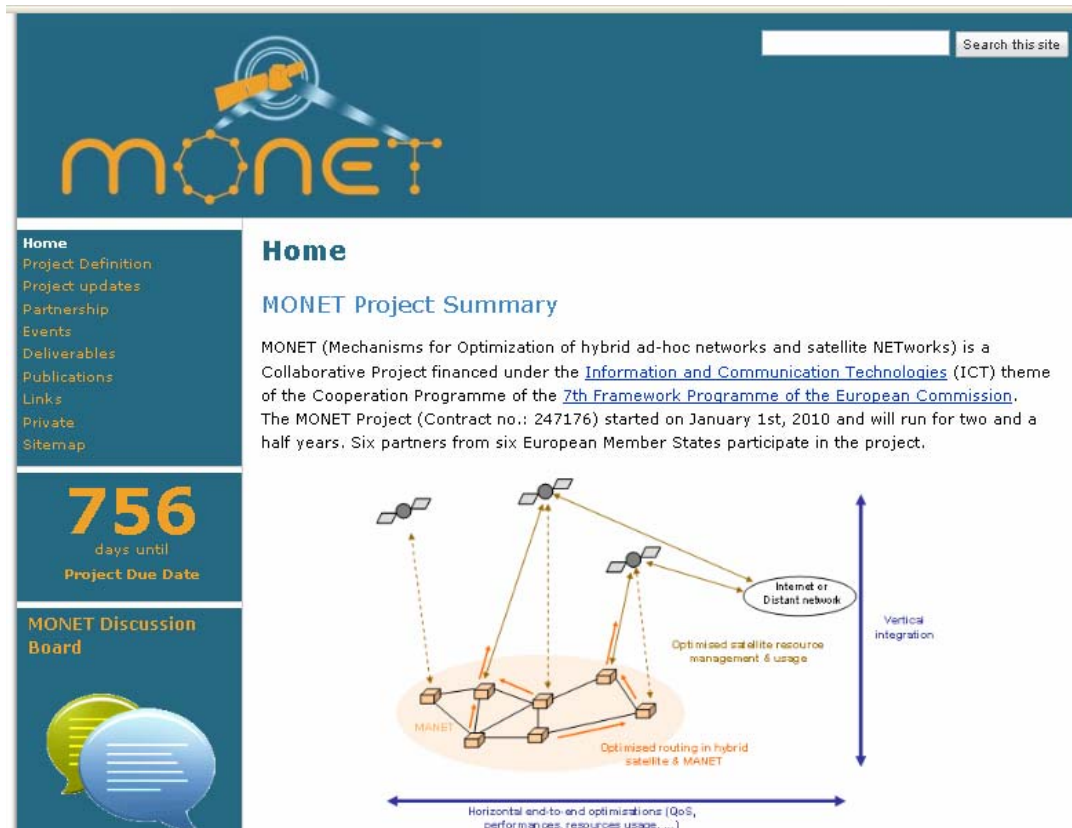


Figure 1 – MONET website homepage.

The website, as reported with detail in D8.1 M6 MONET deliverable, includes the following sections, as it is visible in the list situated in the right side of the homepage. Hereafter some updates to the first version of the web site are also reported:

- **Home:** section reporting MONET Project Summary providing the main concept and general information about the project.
- **Project Definition:** section illustrating the objectives and the expected results of the project. It reports the Work Breakdown Structure (WBS) of MONET as well.
- **Project Updates:** section containing the latest news about the MONET project and related issues (e.g. events, main results, ...).
- **Partnership:** section with detailed information on each partner of the MONET consortium (brief description and fields of interest, contacts and links to official member homepages).
- **Events:** section containing the list all the MONET related events, such as scheduled events related to MONET and events which MONET partners will attend and/or organize (basically meetings open to public, or dissemination events).
- **Deliverables:** section reporting the list of all MONET public deliverables. The following two deliverables have been uploaded on the web site in the second six months of the project:

- D8.1 - Dissemination and Standardisation Reports M6 and
- D2.1 - MONET concept and use-cases.
- **Publications:** section containing the list of MONET publications (e.g. white papers, papers, presentations). This section has been updated by introducing a single section of each paper with authors and abstract details as well as a link for the direct download of the paper, if available. The following figure shows the new structure of the section:

Publications

Conference and workshop papers

This section lists all the paper published to conferences and workshop within the context of MONET project.

<i>Title of the paper</i>	<i>Author(s)</i>	<i>Event</i>	<i>Location</i>	<i>Date</i>	
On Optimizing Hybrid Ad-hoc and Satellite Networks - the MONET Approach	A. Oliveira, Z. Sun, M. Monier, P. Boutry, D. Gimenez, A. Pietrabissa, K. B. Juros	Future Network & Mobile Summit 2010	Florence, Italy	16-18 June 2010	Details
MDP Call Control in Variable Capacity Communication Networks	A. Pietrabissa, F. Delli Priscoli	18th Mediterranean Conference on Control and Automation	Marrakech, Morocco	23-25 June 2010	Details
Reinforcement Learning Call Control in Variable Capacity Links	A. Pietrabissa	18th Mediterranean Conference on Control and Automation	Marrakech, Morocco	23-25 June 2010	Details

Conference papers

Title of the paper	On Optimizing Hybrid Ad-hoc and Satellite Networks – the MONET Approach
Author(s)	A. Oliveira, Z. Sun, M. Monier, P. Boutry, D. Gimenez, A. Pietrabissa, K. B. Juros
Location	Florence, Italy
Date	16-18 June 2010
Link to event page	Future Network & Mobile Summit 2010
Abstract	The potential of Mobile wireless Ad hoc Networks (MANET) is significantly high. However, MANET applications often happen in infrastructure-less or remote regions where remote connectivity to the outside world has to be provided by some other means. Satellite is one of the solutions to provide this and sometimes the only solution. Current expectations dictate that satellite will be seen not only as a component of an alternative routing path but also as part of a unique (really integrated) system. The concept of a hybrid MANET-Satellite network is therefore a natural evolution of considering the problem of providing local and remote connectivity in a highly mobile, dynamic and often remote environment. These composite networks raise significant challenges such as: optimising network resources and link availability; providing Quality of Service (QoS) and Quality of Experience (QoE); minimizing costs and energy. The EC FP7 project MONET will address precisely these issues by considering the end-to-end optimization of resource management in a hybrid network, taking into account its impact on both the MANET and satellite segments.
Download paper	See the attachments below.

Attachments (1)


 On Optimizing Hybrid Ad-hoc and Satellite Networks – the MONET Approach.pdf - on 1 Oct 2010 19:55 by Guido Oddi (version 1)
188k [View](#) [Download](#)

Figure 2 – Publications website section.

- **Links:** section with links to other projects, entities, organizations, news, etc. that are relevant for MONET. This section has been updated by introducing some links to international conferences and important journals whose topics are related to MONET concepts.
- **Sitemap:** the map of the MONET website, listing the whole structure of the site.

Both the MONET logo and the website have been the object of MONET deliverable D8.2, delivered at month 6 of the project. It is remarkable to report that typing “ICT MONET” in the input text-field of the Google search engine, the MONET web site is the first to appear. This good feature allows to increase the reachability of the site and the publicity of the MONET project and up-to-date results.

5 Organization and participation to events

This section provides a list of events organized in the context of MONET project and a list of conferences and other dissemination activities to which MONET partners have participated in the period of interest. Section 5.1 illustrates events which have been organized by MONET project to disseminate results. Section 5.2 shows conferences to which MONET partners have participated and other dissemination activities.

5.1 Organization of events

No dissemination events have been organized by the MONET consortium during this period.

5.2 Conferences and other dissemination activities

5.2.1 Farnborough Airshow 2010

Several MONET partners were present at the Farnborough Airshow held in Farnborough, UK between July 19th and July 25th. TEKEVER, UNIS and ASTRIUM in particular were exhibitors at the show. TEKEVER representatives had the opportunity to discuss the project with many of the professional visitors (including non Europeans) and explained the MONET objectives and main challenges to the visitors of TEKEVER's stand, who showed lively interest in the project. TEKEVER provided the most interested with the project's website URL for further analysis.

5.2.2 Future Networks 6th FP7 Concertation Meeting

MONET was present at the 6th FP7 Concertation Meeting held in Brussels between October 18th and October 20th, where the project was also presented by TEKEVER through Mr. Ricardo Mendes and discussed. Mr. Mendes presented the project, briefly reminding the audience of MONET objectives, challenges and the considered scenarios. Major achievements carried out up to end of October 2010 were also presented, namely the progress performed at the MONET architecture level.

5.2.3 Integrated Satellite Initiative (ISI) General Assembly

The project was presented to the Integrated Satellite Initiative (ISI) members during the Security Working Group slot at the ISI general assembly held in Brussels on the 30th of November 2010, by the coordinator, Mr. Pedro Sinogas. The presentation made during the event described the project concept, its main objectives and main achievements up to the end of November 2010. All MONET partners (except URSZR) attended the ISI General Assembly and were able to discuss the project with other ISI members.

5.2.4 Interactions with PSCE forum

In November 2010, the MONET consortium had some exchanges with the forum for Public Safety Communications Europe (PSCE) on potential cooperation between MONET and PSCE regarding the stimulation of cooperation between end-users and services providers. The forum approached the project since forum representatives believe MONET to be very relevant to public safety communications. MONET demonstrated its support to the initiative setup by PSCE by providing a letter of support. The consortium believes this cooperation may increase significantly the chances of interaction between MONET and the end-user community and more opportunities to present and discuss project results with the end-users will undoubtedly arise in the near future.

6 Publications

This section covers a number of dissemination activities, including papers accepted for publication in journals and conferences with peer reviewing, papers submitted for conferences and journals with peer reviewing, dissemination publications in more general journals.

6.1 Accepted Papers

The following scientific papers have been accepted for publication in scientific conferences with peer reviewing:

- B. Tavčar, “*Model for calculation of a distance of co-channel cells*”, Electrotechnical conference ERK, Portoroz, Slovenia, from 20th to 22nd September”, <http://www.ieee.si/erk10/>.
 - ABSTRACT: This paper describes a model to calculate the distance of co-channel cells. The base of the model is Hata propagation model with the hypothesis of normal distribution of fading. At the end a comparison between the results of the described model and the model with Hata Dawidson propagation model is made. The mathematical model for the calculation of Co-channel interference, which is also used in MONET networks, has been presented.
- M. Podberšič, Ph.D. “*A renovation of a public warning system*” Electrotechnical conference ERK, Portoroz, Slovenia, from 20th to 22nd September”, <http://www.ieee.si/erk10/>.
 - ABSTRACT: The uniform public warning system in Slovenija is in the renovation stage. A study of renovation was made in 2006. It includes a sound coverage planning. The sirens are radio controlled. A professional DMR radio network is used. On this network, we tested data transmission within the scope of MONET project. The network will also be used in the Mountain rescue scenario -MONET project.
- A. Oliveira, Z. Sun, P. Boutry, D. Gimenez, A. Pietrabissa, K. B. Juros, “*Internetworking of satellite and wireless ad hoc networks for emergency and disaster relieve services*”, International Journal of Satellite Communications Policy and Management (IJSCPM), as the invited paper.
 - ABSTRACT: The flexibility of Mobile wireless Ad hoc Networks (MANET) and global coverage of satellite communications presented an idea combination to provide emergency and disaster relieve services. This paper presented the concept of a hybrid MANET-Satellite network developed in the On Optimizing Hybrid Ad hoc and Satellite Networks (MONET) project funded within the EU 7th Framework Programme (FP7). It was considered to be a natural step of providing local and remote connectivity in a highly mobile, dynamic and often remote environment for emergency and disaster relieve services, such as forest fire fight, mountain rescue and coast rescue. These composite networks raise significant challenges including: optimising network resources and link availability; providing Quality of Service (QoS) and Quality of Experience (QoE); minimizing costs and maximizing energy efficiency, taking into account its impact on both the MANET and satellite segments.
- Muhammad Ali, L. Liang, Z. Sun, H. Cruickshank, “*Optimization of SIP Session Setup for VoIP over DVB-RCS Satellite Networks*”, International Journal of Satellite Communications Policy and Management (IJSCPM).

- ABSTRACT: With the proliferation of the Internet, voice over IP has penetrated in both terrestrial and satellite networks. One of the popular protocol responsible for its widespread usage is SIP. SIP is the signaling protocol responsible for the session establishment and termination. By default, it uses UDP as the transport layer protocol. As UDP is an unreliable protocol, the retransmission of the SIP messages is managed by the application layer, using exponential backoff algorithm. In this paper, this retransmission algorithm is studied in satellite environment. Based on the shortcomings of this algorithm, a new algorithm is proposed. The performance of the new algorithm is tested and evaluated on the satellite network testbed at Centre for Communication Systems Research (CCSR), University of Surrey. The results show that the performance of the new algorithm is better than the basic one, in terms of number of retransmissions of SIP messages and their bandwidth consumption, in addition to reduction in call setup time.
- L. Liang, M. Bhutta, H. Cruickshank, Z. Sun, C. Kulatunga, G. Fairhurst, “*The Integration of TESLA and FLUTE over Satellite Networks*”, IEEE GLOBECOM 2010, December 6-10, 2010, Miami, USA.
 - ABSTRACT: researches on multicast has explored security challenges faced by group communications. Multicast transport protocols and multicast security protocols need to work closely to provide reliable and secure multicast services. However, there has been comparatively little work carried out to specify how exactly the two technologies can work together efficiently. In this paper, authors present an example of partially integrating the Timed Efficient Stream Loss-Tolerant Authentication (TESLA) protocol and the File Delivery over Unidirectional Transport (FLUTE) protocol. TESLA provides source authorization and data integrity for multicast groups while FLUTE ensures reliability of the multicast transmission. This paper proposes a loose synchronization mechanism for a unidirectional transmission environment, suited to satellite networks. The proposed algorithm was implemented on a testbed with multicast tunnel between University of Surrey and University of Aberdeen and the results are presented in this paper.

6.2 Submitted Papers

No scientific papers have been submitted and not yet evaluated and accepted for publication in scientific conferences and journals in the period of interest.

7 Standardization

Task 8.3: Standardisation has started at Month 6 and will last up to the end of the project. This document reports all standardisation activities carried up during the period of interest.

Organizations such as IETF, ETSI, ITU-T and MESA are of particular importance to the work considered in MONET and the partners will interact with the relevant working groups or committees to provide contributions. The following table summarises MONET contributions to standardisations efforts:

Relevant Standardisation Body	MONET Contributions	Partners Involved
IETF: <ul style="list-style-type: none"> IP performance Metrics (ippm) MANET WG 	Potential contributions to protocols (reactive and proactive); End-to-end QoS and IP over satellites; MANET architectures	TEK, UNIS
ETSI: <ul style="list-style-type: none"> TC TISPAN: WG2, WG4, WG8 TC-SES/BSM TC-SES/SatEC Cooperative ad-hoc network 	Inter-working and interoperability with existing networks; Routing; Contribute with needs and aspirations for network management; IP over satellite	TEK, UNIS, ASTR
ITU-T <ul style="list-style-type: none"> ITU-T SG 13 – “NGN” ITU-T SG 12 – “Performance, QoS and QoE 	Architecture, evolution and convergence of next generation networks including planning, implementation scenarios and deployment models; IP QoS, interoperability and implications for NGN.	UNIS
MESA <ul style="list-style-type: none"> TSG-SYS 	Potential contributions to the MESA specifications and system reference models and architectures; knowledge on broadband satellite constellations interconnection.	TEK, ASTR

Table 2 – MONET contributions to standards

In what concerns already developed activities, UNIS attended the ETSI Combined Satellite Broadband Multimedia (BSM) and the Mobile Satellite Subsystems (MSS) meeting on 25-27 May 2010 in Cambridge UK. UNIS submitted an overview MONET presentation, which was registered as SESBSM(10)0016 document. The presentation was well received and generated good interest by ETSI members such as Hughes and Thales Alenia Space. The future plans are to contribute the MONET finalised satellite architecture and solutions to BSM and the MSS groups.

TEKEVER has not established formal contacts with standardisation groups, but has prepared presentation material and established an internal plan and agenda for contacting the relevant groups, namely MESA, ETSI and IETF.

UniS monitored MANET WG activities for last three months. In summary, IETF MANET routing drafts DYMO and OLSR v2 are still ongoing. Both protocols have several implementations however none of them were released as public open source. Several drafts of MANET routing mechanisms are proposed in IETF draft. The most interesting drafts are below list:

- Reliable MANET routing mechanism based on node mobility detection.
- Survey of IP address auto-configuration mechanism for MANET at draft version 5: this draft gives the overview of auto-configuration mechanisms in the literature.
- Dynamic link exchange protocol (DLEP) is proposed for generalized link exchange.
- OLSRv2 backpressure traffic engineering extension considers the traffic engineering factor in MANET routing protocol.
- Multi-path for OLSR v2 is routing algorithm of multi-path in OLSR.



All drafts except the mainstream MANET routing protocols DYMO and OLSR v2 are extension work to the existing protocol. The charter of IETF looks into more general solution in MANET instead of proposed a new MANET routing in the near future.



8 Conclusions

This report presented the activities developed in the context of MONET work package WP8 in the second 6 months of the project, in the period from the 1st July 2010 to the 31st December 2010. The report includes both already executed activities and some of the plans for the remainder of the project.

The objectives of the WP8 activities are to ensure the dissemination of the project results to a wide reaching audience, in order to make external stakeholders and the community in general more aware of the results achieved by MONET, as well as to encourage the academy and the industry to refine and use them. A particular attention is given to standardisation task: the interaction between the MONET partners and the relevant working groups and committees is carried out in order to monitor and provide contributions to the working group activities. Another objective of WP8 is to create adequate conditions for extensive exploitation of MONET results, during and after project execution.

In the period covered by this report, the following activities were carried out:

- Update of the MONET public website following the project developments.
- Submission of papers to peer-reviewed conferences and journals, based on MONET research work.
- Participation to international workshops and conferences.
- Dissemination of MONET concept in conferences and seminars.
- Standardisation activities.

As the research work takes place, the number and the impact of dissemination activities are expected to increase. Since the project moves into its central phase, in which several significant results will be produced, the publication of scientific articles in journals and conferences will grow as well as the related standardisation activities. Moreover, in the next periods we plan to pay special attention to increasing the number of organized events and the participation on other joint liaison and concertation activities, such as concertation meetings and other specialized events.



References

FP7-ICT MONET (Mechanisms for Optimization of hybrid ad-hoc networks and satellite NETWORKS) collaborative project financed under grant agreement n. 247176 and started on January 1st, 2010.

MONET project website, <http://www.ict-monet.eu>.

Google sites, <http://sites.google.com/>.

PSCE Forum, Public Safety Communication Europe Forum, <http://www.psc-europe.eu/>.

IETF, The Internet Engineering Task Force, <http://www.ietf.org/>.

ETSI, European Telecommunications Standards Institute, www.etsi.org/.

ITU-T, International Telecommunication Union – Telecommunication Standardization Bureau, <http://www.itu.int/ITU-T/>.

MESA, Mobility for Emergency and Safety Applications, <http://www.projectmesa.org/>.

OLSR, Optimized Link State Routing Protocol, <http://www.ietf.org/rfc/rfc3626.txt>.