



AMBIENT ASSISTED LIVING JOINT PROGRAMME
CALL 1: ICT BASED SOLUTIONS FOR PREVENTION AND MANAGEMENT
OF CHRONIC CONDITIONS OF ELDERLY PEOPLE

PROJECT REFERENCE: AAL-2008-1-061

PROJECT TITLE: A TECHNOLOGY PLATFORM FOR THE ASSISTED LIVING OF DEMENTIA
ELDERLY INDIVIDUALS AND THEIR CARERS



DELIVERABLE NUMBER: D7.1-2

DELIVERABLE TITLE: Final dissemination activities report

WP RELATED TO THE DELIVERABLE: WP7 (Task 7.1)

DISSEMINATION LEVEL: (PU/PP/RE/CO)*: PU

NATURE OF THE DELIVERABLE: (R/P/D/O): R**

CONTRACTUAL DATE OF DELIVERY TO THE AAL-CMU: 31.01.2012

ACTUAL DATE OF DELIVERY TO THE AAL-CMU: 29.02.2012

WPL/TL RESPONSIBLE FOR THE DELIVERABLE: ICCS

AUTHOR(S): Maria Haritou, ICCS

CONTRIBUTOR(S): All

REVIEWER(S): Silke Cuno, Fraunhofer FOKUS

ABSTRACT:

This document constitutes the final dissemination report of the ALADDIN project. It contains the general dissemination plan that was elaborated already from the beginning of the project and the entire dissemination and promotion activities that have been carried out in the whole project duration.

The report contains activities of the consortium related to organising and participating in conferences, workshops and forums, publishing papers in scientific journals, newsletters and the local press, producing project dissemination material (flyers, brochures, posters, etc) and developing electronic means of dissemination (web site).

KEYWORDS: dissemination, promotion, marketing

*** Dissemination Level:**

PU=Public

PP=Restricted to other programme participants
(including AAL-CMU Services).

RE=Restricted to a group specified by the consortium
(including AAL-CMU Services).

CO=Confidential, only for members of the consortium
(including AAL-CMU Services).

**** Nature of Deliverables:**

R=Report

P=Prototype

D=Demonstrator

O=Other

AAL FUNDED PROJECT AAL-2008-1-061

D7.1-2 – Final dissemination activities report

AUTHOR(S): Maria Haritou
ORGANISATION(S): ICCS
VERSION: 1.0
DATE: 29.02.2012
DISTRIBUTION: All
CODE: D7.1-2_Final dissemination activities report_v1.0

© Copyright of the ALADDIN Consortium

LIST OF PARTICIPANTS

Part. No	Participant Name	Short name	Country & Funding Agency
1	INSTITUTE OF COMMUNICATION AND COMPUTER SYSTEMS	ICCS	GREECE, MINISTRY OF DEVELOPMENT
2	FRAUNHOFER FOKUS	FOKUS	GERMANY, VDI/VDE INNOVATION + TECHNIK GMBH
3	UNIVERSITY OF BOLOGNA	UNIBo	ITALY, MINISTRY OF UNIVERSITY AND RESEARCH
4	THE PSYCHIATRIC HOSPITAL OF ATTICA	DAFNI	GREECE, MINISTRY OF DEVELOPMENT
5	THE NATIONAL HOSPITAL FOR NEUROLOGY AND NEUROSURGERY	NHNN	UNITED KINGDOM, TECHNOLOGY STRATEGY BOARD
6	BADALONA SERVEIS ASSISTENCIALS	BSA	SPAIN, MINISTERIO DE INDUSTRIA, TURISMO Y COMERCIO
7	ATOS RESEARCH AND INNOVATION	ATOS	SPAIN, MINISTERIO DE INDUSTRIA, TURISMO Y COMERCIO
8	AETHIA S.r.l.	AETHIA	ITALY, MINISTRY OF UNIVERSITY AND RESEARCH

EXECUTIVE SUMMARY

This document describes the dissemination efforts that have been made by the consortium in the whole project duration. It contains a general part, providing the overall dissemination strategy and planning and a second part describing the specific dissemination activities that have been performed by the consortium partners either collectively or individually. This report is an updated complete version of the previous intermediate draft version (D7.1-1) which has been submitted at M12 and covered the first project period. The final dissemination activities' report includes the entire dissemination activity of the consortium in their constant effort to disseminate the project's objectives and achievements to the widest possible audience throughout the project's life-time.

This document starts with an introductory section (chapter 1) describing the scope of D7.1 and an overview of the expected results.

The second chapter provides the overall dissemination methodology and planning

The third chapter describes the communication plan including the identification of target groups and the selected dissemination channels and means.

The fourth chapter describes the actual dissemination activities that have been performed by the partners in the whole project duration. It starts with the collective dissemination activities performed by the consortium as a whole, and proceeds with the description of individual efforts of each partner.

The fifth chapter provides some conclusions extracted by the dissemination work that has been performed by the consortium, and the experience that was gained through the project implementation and the communication with relevant stakeholders and groups of interest.

Finally, the document contains five Annexes (A-E) providing (A) ALADDIN web site screenshots, (B) the ALADDIN flyers and posters (C) event related materials and a list of ALADDIN presentations given (D) the abstracts of ALADDIN publications in conference proceedings and journals and (E) the ALADDIN Final Workshop materials.

Table of Contents

1.	Introduction.....	7
2.	Overall Dissemination Methodology and Planning.....	9
2.1	Group-Based Promotions.....	9
2.2	Dissemination through Media.....	9
2.3	Dissemination on Demand.....	9
2.4	Dissemination through events.....	10
3.	Communication plan.....	11
3.1	Target audience identification.....	11
3.2	Dissemination channels and means.....	12
4.	ALADDIN Dissemination Activities.....	13
4.1	Collective Dissemination Activities.....	13
4.1.1	ALADDIN dissemination materials.....	13
4.1.2	ALADDIN at various events.....	14
4.1.3	ALADDIN publications.....	15
4.2	Individual Dissemination Activities.....	17
4.2.1	ICCS.....	17
4.2.2	Fraunhofer FOKUS.....	18
4.2.3	UniBo.....	20
4.2.4	DAFNI.....	21
4.2.5	NHNN.....	21
4.2.6	BSA.....	22
4.2.7	ATOS.....	24
4.2.8	Aethia.....	25
5.	Conclusions.....	26
	Annex A: Screenshots of the ALADDIN web site.....	27
	Annex B: ALADDIN Flyers.....	30
	B1. General Introductory Flyer (ICCS).....	30
	B2. ALADDIN System Flyer (FOKUS) (in German).....	31
	B2. ALADDIN System Flyer (FOKUS) (in English).....	33
	B3. ALADDIN POSTER for the AAL Forum 2011 (FOKUS).....	35
	Annex C: Event Related Materials and List of Presentations.....	36
	C1. ALADDIN list of Presentations.....	36
	C2. ALADDIN team in Events.....	38

Annex D: Abstracts of ALADDIN Publications.....	40
Annex E: eHealth workshop organised by the Department of Health of the Catalan Government.....	43
Morning session Program.....	43
Afternoon Session – ALADDIN Workshop Program	44

1. INTRODUCTION

ALADDIN is a European project with significant potential future impact involving many organisations of different types. The vision of ALADDIN was to develop a trustworthy and reliable system supporting patients with dementia and their informal carers in the management of the disease from home. Based on a set of monitoring parameters and measuring scales feeding the risk assessment component, the system aims to early detect symptoms that predict decline, avoid consequent emergencies and secondary effects and, ultimately, prolong the period that patients can remain safely cared at home.

At the same time, the system aims to support the informal carers who suffer the physical and psychological burden of care-giving, by providing tools for the clinical assessment of the carers' condition and detect early signs of depression, anxiety or distress that could lead to disease development to the carers themselves. Therefore carers are also closely monitored through quantitative scales assessing Carer Burden and Quality of Life, whereas additional features supporting networking, education and cognitive stimulation of either the carer or the patient are also integrated in the ALADDIN platform, providing a complete system for dementia management from home, addressing all levels of need.

Finally, the platform provides clinicians with a web-based application, so they can easily access the system from wherever they are through a web-browser. Through their web-based interface, clinicians are provided with all the required functionality for effective patient management, efficient follow-up and reliable decision support in their every-day clinical practice.

Therefore, the platform supports carers, patients, clinicians and other service providers in efficiently planning, managing and monitoring the patients' and carers' health status, primarily to avoid emergencies and secondary effects caused by a cognitive, psychological or behavioural decline of the patient, and secondarily to relieve the stress experienced by the carer so that the Quality of Life of both can be maintained and optimally supported.

The system features described above have a direct impact on the quality of life of patients suffering from dementia and their carers, but they might also have a significant impact on the national healthcare systems, allowing for the reduction of costs resulting from the delayed institutionalisation of the patients. Thus, the project can also play a role in the formulation of a more effective and efficient evidence-based home care strategy taking into account the individual characteristics of the patients, for enhanced prevention and diagnosis, which will boost the patients' independence, mobility and quality of life.

Nevertheless, even though the project is targeted towards patients suffering from dementia and their carers, the envisaged solution may as well be easily adapted to meet different societal and organisational needs across Europe, as for example for the self-management of other mental disorders or chronic conditions. The ALADDIN platform has been built as a holistic platform, comprising of different modules, which may be used either as standalone modules or as an integrated platform to be adapted to other clinical cases.

It is evident from the above that ALADDIN is a multidisciplinary project, involving technology research and innovation, clinical novelty, policy considerations as well as business workflows' harmonisation and efficiency aspects. This multidisciplinary nature of the project determines also the promotion and dissemination planning that has been made, involving different types of target audiences and dissemination channels. There are three distinct groups of partners in the ALADDIN consortium, namely: Clinical Sites (users), Technical providers (commercial) and Academic partners (R&D) with distinct exploitation and dissemination interests and plans, therefore the dissemination planning has been made taking into account the specific needs, interests and capabilities of each group.

This document describes all the dissemination efforts that have been made in the whole project duration. The first part of the document provides the dissemination strategy and

planning that was made already from the beginning of the project. The second part provides the specific dissemination and promotion activities that have been carried out either collectively by the consortium as a whole, or by partial partner collaborations, or individually by each partner in the life time of the project. This report is an updated complete version of the previous intermediate draft version (D7.1-1) which has been submitted at M12 and covered the first project period.

2. OVERALL DISSEMINATION METHODOLOGY AND PLANNING

ALADDIN moved along several promotion/dissemination concepts, each of which followed a different route for dissemination according to the kind of access reserved to external people such as access through media, on demand or through events. Dissemination was also based on the contribution that ALADDIN actors brought to specific sectors as group-based promotion in the medical community.

For any dissemination concept however, the basic line of thinking is that the work packages need to produce some first results before we can generate material that is worthwhile and includes enough content and information to enable adequate and effective dissemination.

In terms of organisation, the idea was to involve the academic/research partners in the scientific evaluation of the project results from peers and in dissemination through events (conferences and seminars), the medical partners involved mainly in the group-based promotion and secondarily in dissemination through events and media and to have the businesses involved in the dissemination on demand and using their own access channels to media to disseminate the ALADDIN platform.

2.1 *Group-Based Promotions*

Targeted events for the medical community and group-based promotions enabled localisation of the project findings and material. The ALADDIN clinical pilot centres were involved in many of the dissemination activities; however, they took especially the lead in organising some local/national events for group-based promotion. ALADDIN research and commercial partners also supported the clinical sites in the regions included. The preparations of setting-up group-based promotion activities started early in the project to make sure that the necessary agreements and arrangements could be made. The actual realisation of this type of activities took place in the second year.

2.2 *Dissemination through Media*

This is the more traditional way of promotion, which includes selected journals, newspapers, scientific or administrative publications, bulletins, newsletters, television at a local or a national level, publication and diffusion of advertising material, brochures, CD-ROM, etc. The recipient is accessed by a spread-as-possible dissemination. ALADDIN used many media for making external people aware of the project, within its budgetary capabilities. Professionally prepared promotional materials were produced. The intent is clearly to enlarge awareness of the technology and applications being experimented to enlarge the potential recipients of the message and increase the number of interested people.

This has been a continuous action that resulted in communication around the ALADDIN system, mainly through channels that the consortium partners already used, or had easy access to. This includes traditional paper-based media and electronic channels. The basic communication set was made when the project was one year underway. Further activities in this respect were planned as of the beginning of the project and were intensified in the second year of the project given that especially the more scientific channels usually take some more time to be effectuated.

2.3 *Dissemination on Demand*

It includes all forms of data archives, which may be consulted by interested users, generally freely or with a limited charge, upon request. The ALADDIN project set-up a dedicated web site having as main objective to diffuse the project results as widely as possible throughout the

medical community and the general public. In particular, the project web site provides an up-to-date view of the ALADDIN platform including:

- Objectives and achievements
- Public deliverables in electronic forms
- Key persons and contacts
- Advertisement and announcement of forthcoming public events (workshops, trials, etc.)
- Reports on events completed (workshops, trials, etc.) and project updates
- Technical page on trials and experiment information/updates
- Co-operation with external bodies of relevance and references to publications and other miscellaneous information

The development of the web-site started at the beginning of the project and in the first half of its implementation was expected to include more general information and content. The aim was to update the material regularly. The site was maintained by ICCS and will remain available for at least one year after the project is finished. The site is integrated to some extent in some of the consortium member's web-sites.

2.4 Dissemination through events

Examples are workshops, conferences, seminars, pilots and any other activities, which lead to the involvement of different spectrum of audiences from different backgrounds not only in the academic and medical sector. In this case, the access is very specific: the audience is generally limited in number but highly qualified and with extended experience in the field. Access through events covers exploitation externally as well as internally within the partners' organisations.

ALADDIN pursued to organise events along with the planned pilots, such as domain workshops and on-site demonstrations of the real-time system operation. One workshop was foreseen at the end of the project. This workshop required some preparation as we intended to invite relations of the partners in the consortium, as well as invitees of the AALA and the AAL CMU. Preparation of the workshop began in the second half of the second year.

3. COMMUNICATION PLAN

The plan of communication is a strategic framework, which aims to fulfil the goals of the project related to publicity. The plan of communication defines the target groups and dissemination instruments to be employed. It also describes the overall strategy that makes it possible to adjust the communication to suit the local situation of each participant and country. This is done mainly through local dissemination planning which is flexible and allows for activities addressed to different audiences according to the judgement of each partner and the specific conditions applying in each country. It also involves the selection of various instruments of dissemination on the local level, depending on their availability and the specific access of each participant to them. In this sense, there are the major activities, identified groups of interest and selected dissemination channels to be used by the project centrally and in parallel, the communication planning allows each partner to perform its own activities, contact different groups in each country that could be also interested and use different means to disseminate the project (i.e. local TV, radio broadcasts etc)

The main goals of communication for the short and long terms are:

- a. To raise public awareness and understanding in the issues related to the project.
- b. To provide the necessary input to relevant policy enforcement bodies in the healthcare provision domain
- c. To exploit the ALADDIN services to a critical mass of healthcare providers in Europe

The project communication planning at a central level involves the target groups and dissemination channels described in detail in the following sections.

3.1 *Target audience identification*

As mentioned above, the project dissemination planning involves the organisation of, and contribution to, different types of events not only related to the specific case of dementia monitoring and management, home care applications and their supporting technologies but also in domains covering wider aspects of the economy and the society. A regional approach model is instrumental for the extension of this concept and the presentation of the project's goals and achievements was planned to be made to a wide range of audiences of different backgrounds and areas of expertise. The audiences of interest that have been identified include:

- Local Health Administrations – these were contacted by the corresponding clinical partners. The ALADDIN platform was demonstrated and disseminated aiming to collect feedback on different levels (including: medical, societal, organisational and business aspects of relevance to Health Administrations).
- Other healthcare providers – these were contacted to follow-up the pilots and their achieved results. Through this type of activities, the project aimed to get input and feedback from other healthcare providers.
- Academia – results have been presented in conferences, workshops, symposia etc. attended mainly by the academic/research and clinical/research partners. The partners used these dissemination media also to get input from peers.
- General Public – including patients and most importantly family members and informal caregivers. This group constitutes the end-users of the ALADDIN services and the consortium made a significant effort to reach them through the public web site, mainstream media and through the pilot sites and the network of clinicians participating in the consortium.

Invitations to the local health administrations and to other healthcare providers to attend demos of the pilot operation were sent by the clinical partners and the pilot sites were accessible until the end of the project. Some demos/training courses were also developed for

the clinical pilot sites at the beginning of the pilot operation phase, on M20-M21. Participation to and/or organisation of conferences, seminars or other events has been pursued throughout the course of the project.

3.2 Dissemination channels and means

The key objective of the dissemination is to raise awareness and understanding of the ALADDIN project and its results amongst the wider possible audience.

This is achieved through the following main methods:

- The ALADDIN Web-site
- The publication of papers in scientific journals
- The production of promotional material
- Contributions to seminars and conferences
- On-site demonstrations and workshops at the clinical pilot sites

The following specific methods were used in the internal and external communication:

- **ALADDIN Web site- ALADDIN mailing lists**

The ALADDIN web site at <http://www.aladdin-project.eu>, deployed and maintained by ICCS, is intended for external audiences and is one of the primary dissemination media for the project. The web site is the source of the most up-to-date information about the project, the project related events and the project deliverables. Four mailing lists were also created and administered by ICCS aiming to facilitate the internal collaboration within the consortium: a general one including all project members, a Clinical one involving the clinicians, a Technical one including the technologists and an Administrative list involving project administration and management people.

- **Publications of papers in scientific journals and conference proceedings**

Scientific publications in journals and international conferences was the main channel selected in the project for the academic/research and clinical/research partners to disseminate the project work and achievements in the academic and medical community and collect feedback and accreditation from peers.

- **Production of promotional material (flyers, posters, etc)**

The production of promotion materials was selected as a means to reach out to the various audiences of interest to the project, including the academia, medical community, end-users, technologists, healthcare administrators, decision makers and the industry. The materials planned include project leaflets, brochures and posters in English but also in partners' languages. Other types of promotional material like radio broadcasts or videos at local TV channels were also considered by the project partners and it was pursued to attract interest of relevant media in each country.

- **Contributions to seminars and other conferences**

The consortium partners pursued their participation in as many events as possible, to present the project objectives and achievements at the various phases of the implementation.

- **On-site demonstrations and workshops at the pilot sites**

On-site demonstrations and workshops were held at the clinical pilot sites, when the ALADDIN pilot operation started. A project workshop was organised at the end of the project (in December 2011) to demonstrate the ALADDIN platform.

4. ALADDIN DISSEMINATION ACTIVITIES

As already mentioned the project dissemination planning involved activities carried out collectively by the consortium, as well as partial activities adapted to country/ partner/condition-specific needs and available means. In the following paragraphs the specific dissemination activities that have been carried out in the whole project duration are described in details, both collectively by the consortium (section 5.1) and individually by each partner when applicable (section 5.2).

4.1 Collective Dissemination Activities

The dissemination effort that has been made in accordance to the overall dissemination methodology and communication plan includes all major activities that were defined and described briefly in the previous sections. It consists of the preparation and production of dissemination materials in paper form and the launch of electronic dissemination media. It also includes publications in scientific journals and conference proceedings, project presentations at various events and system demonstrations in smaller user groups and other relevant actors. In detail, the activities that have been carried out are given in the following paragraphs.

4.1.1 ALADDIN dissemination materials

Under the term dissemination material, we consider all materials that have been prepared and produced by the project either in paper or in electronic form, including the project's official web site.

4.1.1.1 ALADDIN web site

The project's web site at <http://www.aladdin-project.eu>, deployed and maintained by ICCS who is the project coordinator and dissemination leader, is intended for external audiences and is one of the primary dissemination media for the project. It is hosted at ICCS's servers and the web site administrator is responsible for the web site updates based also on the input from the other partners. The web site is the source of the most up-to-date information about the project, the project related events and the project deliverables and it was regularly updated with information on the project achievements and activities.

The following pages are available on the site:

- *Home*: gives the very basic project information and provides links to the project summary, the background problem and the project's objectives and vision
- *Consortium*: describes the consortium as a whole and provides links to the individual partners profiles and web sites
- *Service*: shows the results of the trials and the specific set-up of the clinical pilot sites
- *News & Events*: All project related events, i.e. events organised by the consortium or attended by the consortium members are listed here. This page also gives access to other links of interest
- *Publications (Press room)*: This page provides a list of the project publications and access to the publication abstract (that can be downloaded) as well as downloads of other published material such as brochures, flyers, etc.

Some characteristic screenshots of the web site are included in this document in Annex A.

4.1.1.2 ALADDIN flyers

According to the DoW, one or more project flyers were foreseen to be produced in the time course of the project. An introductory one in English, providing a general description of the project objectives and visionary results has been prepared and produced in 5000 copies on M13. The preparation of the flyer has been coordinated by ICCS with the support and contribution of other consortium members, especially NHNN. The flyer has been distributed at various events that consortium members have participated in, including the two AAL Forums of 2010 in Odense, Denmark and of 2011 in Lecce, Italy.

A second flyer has been produced at M25 providing a concrete technical presentation of the ALADDIN platform that has been developed. The preparation of this flyer was coordinated by FOKUS and has been produced in English and German. This flyer has also been distributed in several events attended by the partners including the AAL Forum 2011 in Lecce.

All flyers are available in electronic form at the project's collaboration server and at the public web-site, so they can be easily downloaded and reproduced according to the needs. They are also provided in this document in Annex B.

4.1.1.3 ALADDIN posters

A poster presentation of ALADDIN has been prepared by FOKUS at M25. The poster was exposed at the poster area of the AAL Forum 2011 in Lecce, and also at the 4th Pan-Hellenic Conference in Biomedical Technology that took place in Athens, Greece, shortly after the end of the project, i.e. on 20-21 January 2012.

The poster is available in electronic form at the project's collaboration server and at the public web-site, so it can be easily downloaded and reproduced according to the needs. It is also provided in this document in Annex B.

4.1.2 ALADDIN at various events

The ALADDIN project participated in all three annual AAL Forums that were organised by the AAL Association in 2009, 2010 and 2011.

- At the AAL Forum 2009 in Vienna, the project had just begun, therefore no presentation was made. However, the project took part at the Forum with members of ICCS, FOKUS and BSA. Moreover, the consortium used this opportunity and held the 2nd project plenary meeting in Vienna, hosted by the Forum organisers.
- At the AAL Forum 2010 in Odense, ALADDIN project had a booth at the AAL Project Village, demonstrating the project's achievements. A number of flyers were distributed at the event, and demos of the client application were presented at the booth at small groups of interested participants. Members of ICCS and BSA participated to this event.
- At the AAL Forum 2011 in Lecce, ALADDIN was presented at the poster exhibition area (poster produced by FOKUS as described in the previous section) and was also presented at the A2 session of the conference (by ICCS). Flyers of the project were handed out to Forum participants by members of FOKUS and ICCS teams attending the event.

Additionally to the AAL Forums, at which the project was represented collectively by more than one consortium partner, individual ALADDIN partners have attended a number of conferences and other events of relevance to the project and have given presentations introducing the project objectives and expected outcomes to the respective audiences. The exact events that have been attended by the partners are described in the respective individual sections of each partner below, whereas some additional materials from each event and a summarising list of ALADDIN related presentations given is provided in this document in Annex C.

Apart from attending various events, collectively or individually, the consortium has also organised two events on its own:

1. “Innovation and AAL” in the Salon Avante Exhibition

Partner BSA organised a workshop entitled “Innovation and AAL” in the framework of the Salon Avante Exhibition that was held in Barcelona, Spain, from 2 to 4 June 2010. Consortium members from partners ICCS, FOKUS and NHNN attended the event in support of BSA and in order to present and discuss the concept and visions of the ALADDIN project with other participants of the event.

2. ALADDIN Final Workshop

The ALADDIN consortium organised the project’s final workshop, which was held also in Barcelona, on 2 December 2011, in the framework of a full day eHealth conference that was organised by the Catalan Government in collaboration with partner BSA and with the support and contribution of all project partners. The conference was organised by the Catalan Department of Health and the Department of Welfare and Social services, addressing tele-health services. The aim of the conference was to conduct and promote a debate about the challenges and the opportunities that ICT-supported health and social services represent. The audience comprised of different stakeholders that have responsibility and interest in the deployment of this type of services. The objective of the conference was to identify the enablers and the barriers to their success in the market and was structured in two parts: the morning session was addressed to national health and social services’ stakeholders, and a number of mature solutions were presented, including a presentation and demonstration of ALADDIN system. The afternoon session was the ALADDIN workshop, which was fully devoted to the project dissemination and was conducted by the consortium.

The programs of both the morning and evening session, along with some pictures taken during the project workshop and system demonstration are provided in this document in Annex E.

4.1.3 ALADDIN publications

4.1.3.1 Scientific publications

In the framework of the project the consortium has achieved to make 6 scientific publications in peer-reviewed journals and conference proceedings, the majority of which are joint publications of more than one consortium partners. The details of the publications are given below and the publication abstracts are provided in this document in Annex D.

1. Konstantinos Perakis, Maria Haritou, Dimitris Koutsouris, «ALADDIN, A technology platform for the assisted living of dementia elderly Individuals and their carers», the International Workshop of Ambient Assisted Living 2009 (IWAAL'09), S. Omatu et al. (Eds.): IWAAN 2009, Part II, LNCS 5518, pp. 878-881, 2009, Salamanca, Spain, June 10-12, 2009.
2. Stefanos Xefferis, Maria Haritou, Konstantinos Tserpes, Alessandro Serretti, Josep Ramon Llopart, Raffaella Calati, Theodora Varvarigou, «Requirements and Specifications’ Analysis for a Monitoring System to Support the Self-management of Dementia Patients at Home», The 3rd International Conference on Pervasive Technologies Related to Assistive Environments (PETRA2010), Samos, Greece, 23-25 June 2010, Day 1, W1.6.

3. Stefanos Xefteris, Aggelos Androulidakis, Maria Haritou, Andrey Baboshin, Yuri Glickman, Francesco D'Andria, Konstantinos Tserpes, Theodora Varvarigou, «*Enabling Risk Assessment and Analysis by Event Detection in Dementia Patients Using a Reconfigurable Rule Set*», The 4th International Conference on Pervasive Technologies Related to Assistive Environments (PETRA2011), Crete, Greece, 25-27 May 2011.
4. I. Sáez, M. Oliveras, M. J. Ciudad, I. Fort, J. R. Llopart, M. Haritou and Aladdin Research Consortium, "A *Technology Platform for the Assisted Living of Dementia Elderly Individuals and their Carers*", Poster presentation at the 7th Congress of the European Union Geriatric Medicine Society (EUGMS), 28 September 2011, Malaga, Spain.
5. CUNO, Silke and Yuri GLICKMAN, Andrej BABOSHIN, Maria HARITOU, Alessandro SERRETTI, Aggelos ANDROULIDAKIS, Raffaella CALATI: *Management, Monitoring and Supporting Dementia Patients at Home by ALADDIN*, eChallenges e-2011 Conference Proceedings, Paul Cunningham and Miriam Cunningham (Eds), IIMC International Information Management Corporation, 2011, ISBN: 978-1-905824-27-4, Copyright © 2011 The Authors www.eChallenges.org.
6. M. Haritou, Y. Glickman, A. Androulidakis, S. Xefteris, A. Anastasiou, A. Baboshin, S. Cuno, D. Koutsouris, "A *technology platform for a novel home care delivery service to patients with dementia*", Special Issue on Ubiquitous Computing in Healthcare (UCH), Journal of Medical Imaging and Health Informatics, (accepted, in Press).

4.1.3.2 Other publications

Apart from peer-reviewed papers published in scientific journals and conference proceedings, the project has also been published in several other media, as listed below:

- Maria Haritou, Yuri Glickman: "ALADDIN: a wish come true for dementia patients", in Science, technology and Innovation, AAL Forum Special edition, Project's Magazine, Insight Publishers Ltd, September 2011, Page 16-18, ISSN 2040-7335.
- Maria Haritou, Silke Cuno, Yuri Glickman, Aggelos Androulidakis, Andrej Baboshin, "ALADDIN: A home care system for the efficient monitoring of elderly people with dementia" Proceedings of the AAL Forum 2011, 25-28 September 2011, Lecce, Italy, (In press).
- Maria Haritou, Yuri Glickman, Aggelos Androulidakis, Stefanos Xefteris, Athanasios Anastasiou, Andrej Baboshin, Silke Cuno, Dimitris Koutsouris, "ALADDIN: A home care system for the efficient monitoring of elderly people with dementia", poster presentation at the 4th Pan-Hellenic Conference on Biomedical Technology, 20-21 January 2012, Athens, Greece.

4.2 Individual Dissemination Activities

4.2.1 ICCS

ICCS is the dissemination leader in the project, and therefore carries an additional responsibility to coordinate the implementation of the collective dissemination activities described in the DoW. The principal dissemination activities performed by ICCS are listed below:

Production and development of dissemination materials

- Designed and launched the project's web site. Special support in this activity was provided by Aethia.
- Hosts and maintains the web site at its servers, provides web site administration and regularly updates the site content
- Prepared the content and layout of the first ALADDIN flyer in collaboration with a professional graphic artists' office
- Undertook the production of the introductory flyer in 5000 copies and distributed it to all partners
- Contributed to the preparation of the project flyer and poster that were produced by FOKUS.

Publications

Prepared, coordinated or contributed to all 9 scientific and other publications that were made by the project and are listed in sections 4.1.3.1 and 4.1.3.2 above.

Organisation/participation to events and conferences

ICCS participated in the following events, at which ALADDIN project was presented and / or demonstrated, through a demo, poster, flyer distribution or oral presentation:

Date / Place	Event name	Type	Audience	Attendee	Participation type
10-12.06.09, Salamanca, Spain	IWAAL'09	Conference	International, Technical	K. Perakis	Oral presentation
29.09-01.10.09, Vienna, Austria	AAL Forum 2009	Conference	International, AAL related, Mixed	M. Haritou	Oral presentation
02-04.06.10, Barcelona, Spain	Salon Avante Exhibition	Exhibition & workshop	International, AAL related, Mixed	M. Haritou	Attendance
23-25.06.10, Samos, Greece	PETRA2010	Conference	International, Technical	S. Xefteris	Oral presentation
15-17.09.10, Odense, Denmark	AAL Forum 2010	Conference	International, AAL related, Mixed	M. Haritou	Booth, demo
25-27.05.2011, Crete, Greece	PETRA2011	Conference	International, Technical	S. Xefteris	Oral presentation
27-2.05.2011, Kavala, Greece	2 nd Pan-Hellenic Conference in Biomedical Technology and Medical Devices	Conference	National, Technical, Medical	M. Haritou	Oral presentation

25-28.09.2011, Lecce, Italy	AAL Forum 2011	Conference	International, AAL related, Mixed	M. Haritou	Oral presentation, session A2
02.12.2011, Barcelona, Spain	ALADDIN Final Workshop	Workshop	Mostly Spanish, Medical, Health Authorities	M. Haritou, A. Anastassiou, S. Xefteris	Oral presentation System Demo
20-21.01.2012, Athens, Greece	4 th Pan-Hellenic Conference in Biomedical Technology	Conference	National mainly, Technical, Medical. Invited speakers from other EU countries present	M. Haritou, A. Anastassiou	Poster presentation

Other dissemination activities

- The ALADDIN team of ICCS held an internal meeting within the Institute and informed the other teams on the project goals and objectives on October 2009.
- The ALADDIN project is listed among the on-going projects of our individual web site (<http://www.biomed.ntua.gr/Ερευνα/ΕυρωπαϊκάΠρογράμματα/tabid/202/language/en-GB/Default.aspx>) and a link is provided to the official ALADDIN web site.

4.2.2 Fraunhofer FOKUS

Production and development of dissemination materials

- Web Site: Set-up and maintenance of a local ALADDIN-Website on the Fraunhofer FOKUS server in German and English language:
http://www.fokus.fraunhofer.de/de/elan/projekte/international/laufende_projekte/aladdin/index.html
- Newsletter: ALADDIN news on the developments were announced or presented in the Fraunhofer FOKUS ELAN international and national Newsletter. The newsletter is distributed via email to a large national and international eGovernment audience two times a year.
- Production of ALADDIN Flyer in German and English language from September 2011
- Production of ALADDIN Poster in English Language September 2011 for the AAL Forum in Lecce for the Poster Presentation in Lecce, Italy.

Publications

Prepared, coordinated or contributed to 6 scientific and other publications that were made by the project and are listed in sections 4.1.3.1 and 4.1.3.2 above.

Organisation/participation to events and conferences

Fraunhofer FOKUS participated in the following events:

Date / Place	Event name	Type	Audience	Attendee	Participation type
27.01.09 Berlin, Germany	2. German AAL Convention in Berlin	Exhibition & workshop	National AAL related, Mixed	Felix Apitzsch	Presentation
April 2009 Berlin, Germany	VDI/VDE	Workshop	National	Felix Apitzsch	Presentation

29.09-01.10.09, Vienna, Austria	AAL Forum 2009	Conference	International, AAL related, Mixed	Silke Cuno	Attendance
02-04.06.10, Barcelona, Spain	Salon Avante Exhibition	Exhibition & workshop	International, AAL related, Mixed	Silke Cuno	Attendance
25.01.10, Berlin, Germany	3. German AAL Convention in Berlin	Exhibition & workshop	National AAL related, Mixed	Silke Cuno	Presentation
26-28.09.11 Lecce, Italy	AAL FORUM 2011	Conference, Poster Presentation	Scientific, AAL- Stakeholders	Silke Cuno	Poster Presentation
12-14.10.11 St. Petersburg, Russia	XIV All-Russian Joint Conference "Internet and Modern Society" (IMS 2011)	Conference, Workshop	Scientific, Russian IT	Yuri Glikman	Presentation, Demonstration
28.10.2011 Florence Italy	eChallenges	Conference	Scientific, European IT Research	Silke Cuno	Presentation
17.11.2011, Düsseldorf, Germany	Medica 2011, Medica Vision Forum organised by the German Federal Research Ministry	Fair and Symposium	Medical Fair, Scientific Forum	Silke Cuno	Presentation
02.12.2011, Barcelona, Spain	ALADDIN Final Workshop	Workshop	Mostly Spanish, Medical, Health Authorities	Y. Glickman, S. Cuno	Oral presentation System Demo
19.12.11 Moscow, Russia	DWIH - Fraunhofer – Workshop Innovation Centre Skolkovo Information event with the Fraunhofer – Gesellschaft Moscow	Workshop	Scientific	Silke Cuno, Yuri Glickman	Presentation, Discussion

Other dissemination activities

➤ ALADDIN-Presentation in the Fraunhofer FOKUS eGovernment Laboratory

Fraunhofer FOKUS has presented and discussed the ALADDIN developments to external guests and internal groups as part of the Fraunhofer FOKUS development portfolio.

Various Presentations and Demonstrations throughout 2011 of the ALADDIN System in the Fraunhofer FOKUS eHealth Laboratory vis-à-vis the industrial and medical partners of Fraunhofer FOKUS like for example CSC, IBM, eGOV CD and many more.

➤ Set-up and delivery of an ALADDIN extension proposal in December 2011

Extension of ALADDIN in a new Proposal: Advanced Longtime MONitoring enhancement to the technology pLatform for the Assisted living of Dementia eIDerly INDividuals and their carers“ (ALMO-ALADDIN). Proposal in the Joint German-Russian production contest the

Federal Ministry for Education and Research (BMBF) and the Russian Foundation for Assistance to Small Innovative Enterprises (FASIE) in the field of applied industry-related research and the cooperation of innovative SME "(tender from October 4 2011). The Partners in the Proposal were: Zentrum für kardiovaskuläre Telemedizin, Charite, Germany GETEMED Medizin- und Informationstechnik AG Potsdam Germany, "Tesla" St. Petersburg "Saint-Petersburg State University ITMO Design Bureau of Modern Technologies".

It is planned to set-up another telemedicine Proposal for Fraunhofer internal funding using the ALADDIN-Platform within the Fraunhofer AAL-Alliance this spring under the coordination of Fraunhofer IIS Erlangen.

➤ **Dissemination of ALADDIN to other EU-networking projects**

Furthermore, Fraunhofer FOKUS communicated and disseminated ALADDIN through its wide-spread international networks and laboratories -see below. The Fraunhofer Gesellschaft or Fraunhofer FOKUS is participating in almost all of these networks named below or is even coordinating them:

- Alliance - Ambient Assisted Living: <http://www.aalliance.eu/public/>.
- BerliOS - The Open Source Mediator: <http://www.berlios.de/index.php.en>.
- DEMO-net - The eParticipation Network: <http://www.demo-net.org/demo>.
- eCAESAR - Centre for Advanced Studies on Electronic Services Romania - <http://www.e-caesar.ro/>.
- eSDI-NET+ - Network for promotion of cross border dialogue and exchange of best practices on Spatial Data Infrastructures (SDI's) throughout Europe, <http://www.esdinetplus.eu/>.
- Fraunhofer-Allianz Ambient Assisted Living: <http://aal.fraunhofer.de/index.html>
- Fraunhofer Institute for Integrated Circuits, Medical Engineering,; www.iis.fraunhofer.de
- Fraunhofer eGovernment Centre: http://137.251.109.60/egov_zentrum/index.php3?sessionid=cdeec1f07da9366f255358b30fa99870.
- Fraunhofer FOKUS network of international eGov Laboratories (<http://www.fokus.fraunhofer.de/egov-lab/>).
- INLETS - International network of Laboratories for eGovernment Technology and services: <http://www.inlets.org>.
- Pan-Lab - Pan-European Laboratory: <http://www.panlab.net/>.
- Polish-German eGovernment Research Base: <http://www.fokus.fraunhofer.de/bereichsseiten/projekte/ResearchBase>.
- Russian-German Centre for Interoperable eGovernment Systems - St. Petersburg
- Qualipso - Quality Platform for Open Source Software: <http://www.qualipso.org/>.
- Zentrum für kardiovaskuläre Telemedizin - Center for Cardiovascular Telemedicine, Charité – Universitätsmedizin Berlin, Germany

4.2.3 UniBo

Publications

The University of Bologna was not allowed any costs for dissemination activities by the Italian AAL National Agency. Therefore, UniBo took part only in joint publications with other partners and participates in 2 scientific publications made by the project and listed in section 4.1.3.1 above.

4.2.4 DAFNI

Project members of PHA-Dafni participated at the following event and presented ALADDIN:

Date / Place	Event name	Type	Audience	Attendee	Participation type
05-08.05.2011 Athens, Greece	21st Panhellenic Congress of Psychiatry	Congress	Mainly national Clinical Invited speakers	M.N. Katsanou C. Tsopelas V. Psarra C. Kanios M. Tigas	Round table

4.2.5 NHNN

The National Hospital for Neurology and Neurosurgery (NHNN) is one of the clinical pilot sites for ALADDIN and is based in the United Kingdom. This pilot site has participated and has been involved mainly in discussions relating to the pilot study. The principal dissemination activities performed by NHNN are listed below:

Production and development of patient and carer information sheets

- The NHNN was the acting Ethics manager for the ALADDIN project. In this role, NHNN prepared participant information sheets detailing the nature of the project for distribution to potential participants and obtaining ethics approval. These were posted to suitable patients and also presented during clinic appointments

Publication of the results of the pilot study

- The NHNN is responsible for publishing the results obtained from the pilot study at all three clinical sites. We are therefore awaiting the completion and collection of all data. We hope to publish research papers in appropriate scientific journals based on the procedures and outcomes of the study and also on the perceived utility of the ALADDIN platform by the patients' carers and clinicians.

Participation in workshops and national and international conferences

- The NHNN made a presentation entitled "The benefits and challenges of integrating telemedicine in existing healthcare systems" to the relevant audience at the end of project workshop held in Dec 2011 at the Catalan Department of Health in Barcelona.
- The NHNN team are also planning to participate at the following conferences to present the final results of the pilot study.

Date / Place	Event name	Type	Audience	Attendee	Participation type
02.12.2011 Barcelona, Spain	ALADDIN Final workshop	Exhibition & workshop	AAL related, Mixed	M. Jahanshahi	Oral presentation
(Upcoming) 17-21.06.12, Dublin, Ireland	MDS 2012	Conference	International	M. Jahanshahi	Oral presentation

(Upcoming) 7-8.11.12, London, United Kingdom	BNS Autumn meeting 2012	Conference	National	M. Jahanshahi	Oral presentation
(Upcoming) 6-10.03.2013, Florence, Italy	AD/PD 2013	Conference	International, conference	M. Jahanshahi	Oral presentation

Other dissemination activities

- The NHNN members have held a meeting within their unit informing the other members about the concept and process of the ALADDIN project
- The team have presented ALADDIN in internal meetings to external collaborators of the team members
- The details of the project, institution and team members are also listed on the website for The Foundation for Assistive Technology (FAST). FAST documents all current and upcoming activity in research and design assistive technology in the UK (Project link: <http://www.fastuk.org/research/projview.php?id=1671>).

4.2.6 BSA

Many different activities to disseminate the objectives and results of the ALADDIN project have been carried out by BSA, along the project lifetime, both within the institution as well as to external organisations, patients and media potentially interested in the ALADDIN project and outcomes.

Production and development of dissemination materials

- Web Site: BSA internet site. News: “BSA and European projects”, since 02/07/2010. Publication about ALADDIN Final conference and the eHealth workshop that was held on 2/12/2011.
Updates on the ALADDIN project at BSA institutional intranet “BSA, seu de la reunion del projecte europeu Aladdin, 01/06/2010 and “Aladdin Final conference and Jornada l’eSalut en el marc dels projectes de la UE”, 25/11/2011.
- Design and production of a leaflet in Catalan, Spanish and English language to be distributed among patients potentially involved in the pilot trials (May 2010).
 - General information: Do you want to be part of ALADDIN?
 - Information for patients using the ALADDIN platform: How to be part of ALADDIN
 - Information for control group patients. How to be part of ALADDIN
- Contributions to the ALADDIN project leaflet design.
- Press release “A European project making use of new technologies to support elderly dementia patients at home”, with an invitation to the ALADDIN final conference that was to be held in Barcelona on 2nd December 2011. Addressed to local, autonomous and national media. 29/11/2011.

Publications

Preparation and contribution to scientific publications as listed in section 4.1.3.1.

Participation in workshops and national and international conferences

Date / Place	Event name	Type	Audience	Attendee	Participation type
27.05.2010 Mataró, Spain	Gentic meeting	Workshop on eHealth and dependence	IT companies & research centres	J.R. Llopart	Presentation
03.06.2010 Barcelona, Spain	Salon Avante Exhibition Innovation and AAL workshop	Exhibition & workshop	International, AAL related, Mixed	J.R. Llopart	Attendance Workshop Organisation
21-22.10.2010 Vic, Spain	XVII Catalano-Balear Geriatric Society Meeting	Congress	National	I. Saez	Poster presentation
25.03.2011 Barcelona, Spain	ForumCIS	Congress	National	I. Saez	Presentation
26.09.2011 Malaga, Spain	7th Congress of the European Union Geriatric Medicine Society (EUGMS)	Congress	International	I. Saez	Poster presentation
02.12.2011 Barcelona, Spain	ALADDIN Final workshop	Exhibition & workshop	Mostly Spanish, Medical, Health Authorities	J.R. Llopart I. Saez A Cabezas I. Fort	Organisation, Presentation, Demo and Exhibition

Other dissemination activities

- ALADDIN project presentations to BSA physicians and health professionals. Clinical session with the Cognitive Diseases Diagnosis and Treatment Unit. “Aladdin: una plataforma tecnologica per ajudar a domicili les persones grans amb demencia i els seus cuidadors. 24/02/2010. Clinical session with the Geriatrics and Palliative treatments Department. 24/03/2011.” El Servei de Geriatria i els projectes europeus Aladdin i HSH”
- Presentation on a possible internal algorithm involving Dementia Comprehensive Assessment Team and physicians on duty
- Dissemination of ALADDIN flyer among health care staff (mainly Home Care Teams) and among key stakeholders from the Department of Health of the Generalitat de Catalunya (Catalan Government).
- Presentation and approval of the abstract “A technology platform for the assisted living of dementia elderly individual and their careers”. XVII Hospitals National Congress.04/2011, Madrid (Spain). The abstract was not finally presented.
- Publication on the press release and news about ALADDIN project and ALADDIN Final conference on the media:
 - Badanotis: www.banotis.com. 30/11/2011
 - Diari de Badalona 02/12/2011
 - Badalona 2000. 02/12/2011
 - Siete días médicos. “A European programme assessing telehealth in patients with mild dementia”. 05/12/2011
 - Redacció mèdica. www.redaccionmedica. Journalist Javier Barbado. 07/12/2011

- Diari Público. “Badalona takes part in a pioneering plan against dementia”. Journalist Marc Ustrell. 08/12/2011
 - Ràdio 4. Midday News. Marc Ustrell. 09/12/2011
 - Badalona TV. Badalona news. Journalist: Silvia Llamas. 14/12/2011.
 - Radio Ciutat de Badalona. Badalona evening. 14/12/2011
 - Radio Ciutat de Badalona. Badalona morning. 15/12/2011
 - Radio Ciutat de Badalona. Infonews. 15/12/2011
- Interview on ALADDIN project with Dr. Ignasi Saez, clinical coordinator of the ALADDIN project at BSA and staff member of BSA’s Geriatrics Department. Journalist: Cristina Pitarque. Media: Ciutat Oberta. RCB. 02/12/2011
 - Organization and dissemination of the workshop ALADDIN: Paving the way for future exploitation, Final Conference of the ALADDIN project, and collaboration and participation in the organization on the eHealth workshop organized by the Department of Health of the Catalan Government, TicSalut, Connect-EU Group and Badalona Serveis Assistencials. Barcelona, 02/12/2011.
 - Interview on the ALADDIN project with Dr. Ignasi Saez, clinical coordinator of the ALADDIN project at BSA and staff member of BSA’s Geriatrics Department. Journalist: Patrícia Palomino. Radio Tiana. 13/12/2011. Morning news and midday news programmes.
 - TV shows at:
 - La Setmana. Badalona TV and other local TVs. 6/1/2012. <http://tvbadalona.xiptv.cat/la-setmana/capitol/capitol-383> (6’45” -13’23”). Broadcasts several times during the day.
 - Set dies. Badalona TV. 23/12/2011
 - Euronews. Julian Gómez. Futuris Programme. To be broadcast from 26.01.2012. <http://www.euronews.net/2012/01/24/healthier-ageing-is-just-a-click-away/> .

The TV shows present the ALADDIN system and include several interviews with carers and four professionals from BSA involved in the ALADDIN project (Planning Director, Geriatric Unit Doctor, Neuropsychology Doctor and Nurse).

4.2.7 ATOS

The Atos contribution to the dissemination is the following:

Publications

AtoS contributed to 1 scientific publication that was made by the project and listed in section 4.1.3.1 above.

Organisation/participation to events and conferences

Date / Place	Event Name	Type	Audience	Attendee	Participation
28/10/2011, Florence, Italy	e-Challenges	Conference	International, mixed	Daniel Field	Oral presentation, Paper

02/12/2011, Barcelona, Spain	NEW HC SERVICES FOR NEW SCENARIOS: TELEMEDICINE AT THE CENTRE	Workshop	Spanish/ Medical	Daniel Field	Oral presentation
02/12/2011, Barcelona, Spain	ALADDIN Final Workshop	Workshop	International, Medical	Daniel Field	Oral presentation

Other dissemination activities

- Atos has conducted internal briefings to various groups within the company. This includes the e-health research unit, the health solutions department and the innovation department.
- Atos has taken advantage of stands and booths at events to distribute flyers, such as at the Future Internet Assemblies in Ghent (December 2010) and Budapest (May 2011).

4.2.8 Aethia

Alike UniBo, partner Aethia was not allowed any costs for dissemination activities by the Italian AAL National Agency. However, the company has performed some dissemination activities and undertook the cost of producing materials on its own budget as described below:

Production and development of dissemination materials

- Web Site: Selected a number of website templates and proposed them to the consortium to choose from. It has also purchased the template that was actually selected by the partners
- Logo: Processed a number (>15) of candidate logos for the project and proposed them to the consortium to choose from.
- Company web site: published a thematic website (Aethia for Life Sciences, www.aethia.com/bio) that includes ALADDIN in the projects section. The Italian version of the web site has been published, the English version is under construction.
- Italian localization of some materials: Italian translation of some official ALADDIN flyers and posters is in progress for further dissemination and potential exploitation of the project results.

Planned dissemination activities

- Presentation of ALADDIN to Bioindustry Park Silvano Fumero (www.bipca.eu) and hosted companies, using also the translated materials
- Presentation to the regional (Piedmont) Innovation Pole bioPmed (www.biopmed.eu), using also the translated materials

5. CONCLUSIONS

Within the ALADDIN project, dissemination activities aimed at (a) presenting the project's objectives, results and achievements to the widest possible audience of relevance, including technological, medical, societal, economical and policy -relevant and (b) to gain input from other people's experiences in order to augment and update its objectives and expected outcomes. In summary, these actions include:

- Organisation of two project workshops and presentations to European and International audiences.
- Set-up and maintenance of a project web site, stimulating discussions and gathering of feedback. Production of dissemination materials, in paper and electronic form.
- Participation to external events to show the project results in live demos. Participation to seminars, conferences, and congresses to present the project concepts and achievements.
- Publication of the project results in peer-reviewed journals and conference proceedings.
- Identification of projects with similar objectives in order to jointly enhance the expected outcomes and disseminate information about the work being accomplished.

The project dissemination plan was designed to properly address all these actions and set-up the elements for their successful achievement. Throughout the course of the project the consortium has made significant efforts in this direction that resulted in a fairly wide dissemination of the project objectives, scope and achievements, in a variety of occasions and through a variety of dissemination media.

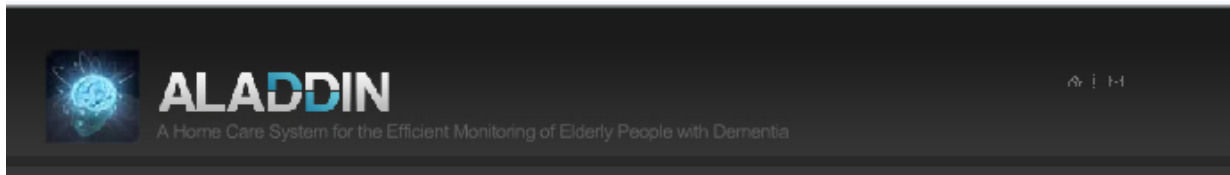
Overall, our experience from presenting and discussing the ALADDIN project in the framework of the dissemination activities that have been carried out, has been that the most important requirement for home care systems dedicated to dementia management, is simplicity. Systems of this kind have to be designed to be as simple and user-friendly as possible, if they are to actually make the lives of the patients and the carers easier, instead of putting an additional burden on them. Low cost is the other most important requirement, especially in the current environment of the economic crisis. Home care solutions have to be first of all affordable by the users, and this parameter must be given a high priority by the developers when it comes to chose between components, parts and devices that are necessary to build their systems. The implementation of fully automated systems is also an open question as regards the benefits to the users when compared to solutions that allow an increased level of self-involvement to the disease management process.

The preliminary results of the small-sized pilot operation that has been performed in the project seem to be positive and promising but there is a clear need for a further pilot study involving a significant number of users testing and validating the system before any safe conclusions can be made as regards the benefits of using the system, in a quantitative manner. While the benefits remain to be proven and quantified, it is worth sharing the feedback provided by our colleague, Prof. Jahanshahi, who was in charge of the pilot running at the National Hospital of Neurology and Neurosurgery in London, in her own words:

[...] We have all been amazed at how 'desperate' and stressed most of the carers are and feel we have opened up the door to an area of real need, which is not adequately covered by existing services as it lies in the no man's land between medical and social services [...]

ANNEX A: SCREENSHOTS OF THE ALADDIN WEB SITE





HOME

CONSORTIUM

SERVICE

NEWS & EVENTS

PRESS ROOM

CONTACT US




CONFERENCES & EVENTS

LINKS OF INTEREST

Conferences & Events

- ALADDIN objectives and vision was presented at the International Workshop on Ambient Assisted Living 2009, in Salamanca, Spain [IWAAL '09](#)
- ALADDIN was [presented](#) at Ambient Assisted Living FORUM 2009, in Vienna, Austria [AAL FORUM '09](#)
- ALADDIN requirements and specifications were presented at the 3rd International Conference on Pervasive Technologies Related to Assistive Environments, in Samos, Greece [PETRA 2010](#)
- ALADDIN partner BSA, organized a workshop entitled "Innovation and AAL" within the Salon Avante Exhibition that was held in Barcelona, Spain, from 2 to 4 June 2010 [SALON AVANTE](#)
- ALADDIN participated at the AAL Forum 2010 in Odense and had a booth at the AAL Project Village [AAL FORUM '10](#)
- The Risk Assessment and Analysis Component that was implemented in ALADDIN platform was presented at the 4th International Conference on Pervasive Technologies Related to Assistive Environments in Heraklion, Crete, Greece [PETRA 2011](#)
- The ALADDIN system functionality was presented as a poster at the 7th Congress of the European Union Geriatric Medicine Society in Malaga, Spain [EUGMS](#)
- ALADDIN was presented at the A2 session of the AAL Forum 2011 in Lecce, Italy. A project poster was also presented at the poster exhibition area. [AAL FORUM '11](#)
- The ALADDIN platform implementation was presented at the eChallenges e-2011 Conference in Florence, Italy [eChallenges 2011](#)
- ALADDIN FINAL WORKSHOP: ALADDIN project in collaboration with the Catalan Department of Health and the Department of Welfare and Social services, is organising a full day conference on tele-health services, to be held in Barcelona on 2 December 2011. The conference wants to address and promote a debate about the challenges and the opportunities that health and social services supported by IT represent. The audience will represent the different stakeholders that have responsibility and interest in the deployment of this type of services. The objective of the conference is to identify the enablers and the barriers to their success in the market. The event is structured in two parts: the morning session is addressed to national health and social services' stakeholders, and a number of mature initiatives will be presented, including a presentation and demonstration of ALADDIN system ([morning session program](#)). The afternoon session is the ALADDIN workshop, which will be fully devoted to the project dissemination ([ALADDIN workshop program](#)).



ALADDIN

A Home Care System for the Efficient Monitoring of Elderly People with Dementia

HOME : CONSORTIUM : SERVICE : NEWS & EVENTS : **PRESS ROOM** : CONTACT US

[PUBLICATIONS](#)
[DISSEMINATION MATERIAL](#)
[DELIVERABLES](#)
[PHOTO GALLERY](#)

Publications

- [Konstantinos Perakis, Maria Haritou, Dimitris Koutsouris, «ALADDIN, A technology platform for the assisted living of dementia elderly Individuals and their carers», the International Workshop of Ambient Assisted Living 2009 \(IWAAL'09\), S. Omatu et al. \(Eds.\): IWAAN 2009, Part II, LNCS 5518, pp. 878-881, 2009, Salamanca, Spain, June 10-12, 2009.](#)
- [Stefanos Xeferis, Maria Haritou, Konstantinos Tserpes, Alessandro Serretti, Josep Ramon Llopart, Raffaella Calati, Theodora Varvarigou, «Requirements and Specifications' Analysis for a Monitoring System to Support the Self-management of Dementia Patients at Home», The 3rd International Conference on PErvasive Technologies Related to Assistive Environments \(PETRA2010\), Samos, Greece, 23-25 June 2010.](#)
- [Stefanos Xeferis, Aggelos Androulidakis, Maria Haritou, Andrey Baboshin, Yuri Glickman, Francesco D'Andria, Konstantinos Tserpes, Theodora Varvarigou, «Enabling Risk Assessment and Analysis by Event Detection in Dementia Patients Using a Reconfigurable Rule Set», The 4th International Conference on PErvasive Technologies Related to Assistive Environments \(PETRA2011\), Crete, Greece, 25 -27 May 2011.](#)
- [Maria Haritou, Yuri Glickman: "ALADDIN: a wish come true for dementia patients", Projects Magazine, Issue of September 2011, pp. 18-20](#)
- [Maria Haritou, Silke Cuno, Yuri Glickman, Aggelos Androulidakis, Andrey Baboshin, "ALADDIN: A home care system for the efficient monitoring of elderly people with dementia" Proceedings of the AAL Forum 2011, In press](#)
- [I. Sáez, M. Oliveras, M. J. Ciudad, I. Fort, J. R. Llopart, M. Haritou and Aladdin Research Consortium, «A Technology Platform for the Assisted Living of Dementia Elderly Individuals and their Carers», Poster presentation at the 7th Congress of the European Union Geriatric Medicine Society \(EUGMS\), 28 September 2011, Malaga, Spain.](#)
- [CUNO, Silke and Yuri GLICKMAN, Andrey BABOSHIN, Maria HARITOU, Alessandro SERRETTI, Aggelos ANDROULIDAKIS, Raffaella CALATI: «Management, Monitoring and Supporting Dementia Patients at Home by ALADDIN», eChallenges e-2011 Conference Proceedings, Paul Cunningham and Miriam Cunningham \(Eds\), IIMC International Information Management Corporation, 2011, ISBN: 978-1-905824-27-4.](#)
- [M. Haritou, Y. Glickman, A. Androulidakis, S. Xeferis, A. Anastasiou, A. Baboshin, S. Cuno, D. Koutsouris, «A technology platform for a novel home care delivery service to patients with dementia», Special Issue on Ubiquitous Computing in Healthcare \(UCH\), Journal of Medical Imaging and Health Informatics, \(accepted, in Press\).](#)



ALADDIN is co-funded by the Ambient Assisted Living (AAL) Joint Programme



ANNEX B: ALADDIN FLYERS

B1. GENERAL INTRODUCTORY FLYER (ICCS)

A Home Care System for the Efficient Monitoring of Elderly People with Dementia

Visionary project results

The integrated ALADDIN platform is expected to provide a trustworthy and reliable system supporting elderly patients with dementia and their informal carers in the everyday management of the disease from their home. It is anticipated that the ALADDIN system will provide the technological means as well as a novel and credible methodology for:

- Efficient patient follow-up
- Early detection of symptoms that predict decline
- Adaptive care / personalised intervention
- Networking / socialisation / education / cognitive stimulation
- Prevention and relief of distress for the carer
- Decision support tools for clinicians

For more info please visit: <http://www.aladdin-project.eu>

ALADDIN



Dr. Maria Haritou
Senior Research Scientist
Institute of Communication & Computer Systems
Biomedical Eng. Lab.
Heron Polytechniou 9,
15773 Zografou, Athens, Greece

Tel: +30 210 7723893
Fax: +30 210 7722431
E-mail: mharit@biomed.ntua.gr
URL: www.iccs.gr
www.biomed.ntua.gr



ALADDIN project is funded by the AAL Joint Programme under the AAL-2008-1 Call.

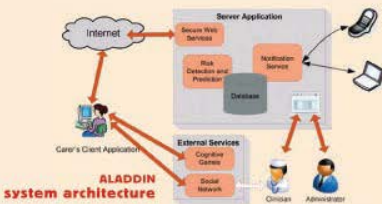


The project duration is 27 months, starting from 1st September 2009, and the budget for its implementation is 1,97M€.



ALADDIN: Supporting the Management of Dementia from Home

ALADDIN's objective is to utilise state-of-the-art in ICT in order to develop an integrated solution for the management of dementia, supporting both the patients and their informal carers in this procedure.



ALADDIN system architecture


The Carer's Client Application is used at home by carers and patients to access the services of the ALADDIN platform securely. Carers fill in the ALADDIN questionnaire for neuropsychological assessment from home, allowing for the patients' cognitive, behavioural and functional assessment. Physiological parameters (body weight and blood pressure) are recorded and submitted by the carer using the application.

Patient records generated through the use of the system include:

- Physiological parameters (blood pressure, body weight, activity level)
- Cognitive, behavioural & daily living assessment (neuropsychological tests)
- Medication follow-up and drug-related adverse events


Carers are also closely monitored, by filling in regularly the questionnaire about the carer's well-being, allowing the assessment of their own physical and psychological burden.

The submitted data is analysed automatically by the Risk Detection and Prediction component and warnings are generated whenever an alarming condition is identified. Warnings can also be sent through the Notification Service to mobile phones or e-mail. External services, such as cognitive stimulation games and social network web pages are integrated into the Carer's Client Application through an embedded web browser.




The Start Page of the Carer's Client Application gives access to:

- My Tasks**, leading to the list of tasks assigned by the clinician to the carer or patient for the current day
- Contact us**, enabling the carer to send a warning message to the clinician requesting him/her to contact the caregiver in the near future
- Social network**, opening into an embedded web browser one of the two separate bulletin boards (forums), one targeting the carers and one targeting the patients
- ALADDIN TV**, containing educational material for the carers




The My Tasks page shows the list of tasks assigned by the clinician to the carer or patient for the current day, including:


- Filling the patient's and carer's questionnaires
- Measuring weight and blood pressure
- Measuring activity through the actigraphic device
- Exercising with cognitive stimulation games or physical exercise videos




Fraunhofer - Institute for Open Communication Systems, Germany




Aina Mater Giustiniana, Università di Bologna, Italy




Psychiatric Hospital of Attika, Greece




The National Hospital for Neurology & Neurosurgery, United Kingdom



Baldoni Ferrini Antidromik, Badalone, Servizo Asistenciais, Spain



Atos Origin, ATOS Origin, Spain



aethia, Aethia Srl, Italy

B2. ALADDIN SYSTEM FLYER (FOKUS) (IN GERMAN)



ELAN
Electronic Government
and Applications

ALADDIN

Ein pflegeunterstützendes System zum effizienten Monitoring von Demenzerkrankten in der häuslichen Umgebung

Im Überblick

Die ALADDIN-Plattform unterstützt Demenzpatienten und deren Betreuer im täglichen Umgang mit der Krankheit im häuslichen Umfeld. Das System basiert auf Methoden der ambulanten Patientennachbetreuung und der angepassten Versorgung. Es integriert Werkzeuge zur kognitiven Stimulation und enthält „Decision-, Support- und Management-Tools“ für Ärzte. Es handelt sich technisch um eine offene, interoperable und integrierte IT-Lösung entworfen nach Prinzipien der Service Oriented Architektur. Vorteile liegen in der Früherkennung von negativen Symptomen durch permanentes Monitoring, damit in der Entlastung der Pfleger und im Erhalt der Lebensqualität für die Betroffenen.

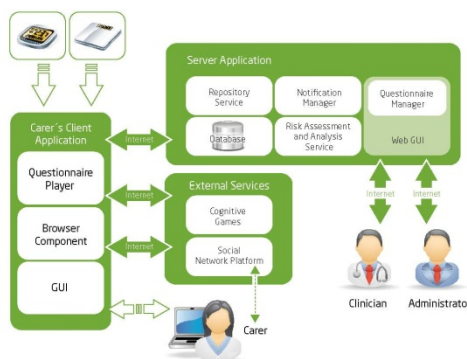


Das ALADDIN Projekt

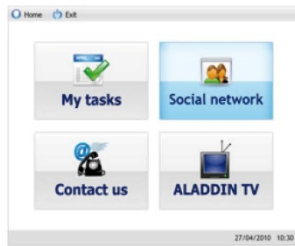
ALADDIN dient der Überwachung des Fortschreitens von Demenzerkrankungen besonders im frühen Stadium. Mehr als die Hälfte der pflegebedürftigen Demenzerkrankten lebt zu Hause. Einsatzort der Technologie ist die häusliche Umgebung, wo Betroffene in der Regel durch ihre pflegenden Angehörigen betreut werden. Alladin entlastet pflegenden Personen im Alltag. Sie erlaubt, den Krankheitszustand der Betroffenen regelmäßig zu erfassen und zu beurteilen. Häusliche Pflege ist nicht immer leicht. Viele pflegende Angehörige leiden selber unter Erschöpfung mit gesundheitlichen Problemen in Folge. Deswegen eröffnet ALADDIN die Möglichkeit, auch das Befinden der pflegenden Personen durch Abfragen regelmäßig zu beurteilen, um rechtzeitig Überlastungszustände zu erkennen. Das System ist ein Ergebnis interdisziplinärer Zusammenarbeit zwischen klinischen Forschungsinstituten und Informatikern.

ALADDIN integriert innovative Technologien. Die Plattform verbessert 1. die heimische Pflege-Umgebung durch Bereitstellung benutzerfreundlicher Technologie zur unauffälligen Überwachung, 2. unterstützt den Erhalt der Gesundheit durch rechtzeitige Früherkennung der Symptome und durch Risikobewertung, 3. stellt durch klinische Überwachung sowie durch Bereitstellung von Social-Networking-Tools und Lernprogrammen ein System zum Krankheits-Selbst-Management bereit. Das System stellt einen Mehrwert für Patienten und Pfleger dar, in dem es Lebensqualität erhält und ihnen hilft, weiterhin ein selbstbestimmtes Leben zu Hause zu führen.

Die Aladdin-Plattform besteht aus drei Teilen: 1. einer Carer-Client-Applikation, 2. einer Server-Anwendung, 3. angebundenen externen Diensten.



ALADDIN System Architektur



Einstiegsseite der Carer's Client Anwendung, die den Zugang zu verschiedenen Systemdiensten ermöglicht



Institute of Communication & Computer Systems, Greece



Alma Mater Studiorum - Università di Bologna, Italy



The National Hospital for Neurology & Neurosurgery, United Kingdom



Psychiatric Hospital Of Attica, Greece



Badalona Serveis Assistencials, Spain



Atos, Spain



Aethia Srl, Italy



Kontakt

ALADDIN
Silke.Cuno@fokus.fraunhofer.de
+ 49 30 3463 7311
www.aladdin-project.eu

Fraunhofer-Institut für Offene Kommunikationssysteme
Kaiserin-Augusta-Allee 31
10589 Berlin, Germany

www.fokus.fraunhofer.de



ALADDIN – Die Carer-Client-Anwendung

Die Carer-Client-Applikation kommt in der häuslichen Pflegeumgebung zum Einsatz und wird von Pflegern und von Patienten verwendet. Pfleger beantworten in der Pflegeumgebung regelmäßig ALADDIN-Abfragen zur neuropsychologische Beurteilung. Unter Nutzung der Anwendung werden vordefinierte physiologische Parameter eingegeben und an den Arzt übermittelt. Die Patienteninformationen, die durch den Einsatz des Systems generiert werden, umfassen:

- physiologische Parameter wie Blutdruck, Körpergewicht, Aktivität
- kognitive Parameter sowie solche, die das Verhalten im Alltagsleben bewerten (neuropsychologische Tests)
- Informationen zu arzneimittelbedingten Nebenwirkungen und unerwünschten Zuständen.

Das Befinden der Pfleger kann durch eigene persönliche Einschätzung der eigenen körperlichen und psychischen Belastungen mittels Abfragen kontrolliert werden. Diese Daten werden automatisch durch die „Risk Detection- und Prediction-Komponente“ analysiert. Die Komponente kann kritische Zustände identifizieren und Warnungen generieren.

Die Startseite der Carer's-Client-Applikation ermöglicht folgenden Zugriff:

My Tasks: führt zu der vom Arzt täglich aufgestellten Liste

Contact us: ermöglicht eine Warnmeldung/ Benachrichtigung an den Arzt zu schicken

Social Network: Öffnung eines eingebetteten Webbrowsers, der zu zwei unterschiedlichen Bulletinboards weiterführt, einen für die Betreuer und einen für die Patienten

ALADDIN TV: enthält Lehr- und Informationsmaterial für Pfleger und Patienten

ALADDIN – Externe Dienste

Externe Dienste werden durch einen integrierten Web-Browser in die Server-Client-Anwendung integriert. Es gibt zwei Arten von eingebetteten Diensten: kognitive Spiele und soziale Netzwerke, die helfen, Kontakt zu Menschen aufzubauen, die sich in ähnlichen Situation befinden. Das hilft mit der eigenen Situation besser zurechtzukommen. Die externen Dienste nutzen externe Web-Portale. Die Web-Browser-Komponente befindet sich in der Server-Client-Applikation. Sie öffnet eine Webseite mit ausgesuchten externen Diensten direkt in der Client-Applikation. Der Soziale-Netzwerk Dienst wird über die Aladdin-Plattform als Web-Forum mit dem Nutzermanagement der Kernplattform integriert. Das zur Verfügung gestellte Forum kann jederzeit beliebig durch alternative Soziale Netzwerk-Plattformen ausgetauscht werden.

Ziele

Das Aladdin-System stellt technische Mittel und neue Methoden zur Verfügung für die:

- effiziente ambulante Patienten-Nachbetreuung
- die Früherkennung von Symptomen, die Verschlechterungen prognostizieren
- adaptive Pflege / personalisierte Intervention
- Networking / Sozialisation / Bildung / kognitive Stimulation
- Prävention und Linderung der Not für die Pflegekraft
- Decision-Support und Disease-Management-Tools für Ärzte

Die Vorteile des Systems liegen erstens in der Möglichkeit, Notfälle zu verhindern, die durch eine Verschlechterung der Symptome verursacht werden. Zweitens werden die Abnahme von kognitiven Fähigkeiten, auffälligem Verhalten, allgemeinen Schwierigkeiten und Nebenwirkungen von Medikamenten wirksam bekämpft. Die Besonderheit von ALADDIN liegt in seinem interdisziplinären Ansatz, der wissenschaftlich akzeptierte medizinische Skalen integriert. Das Langzeit-Monitoring System überwacht nicht nur den gesundheitlichen Zustand der Patienten, sondern auch den der Pfleger. Darüber hinaus ist ALADDIN interoperable konzipiert. Die ALADDIN-Technologie ist nicht auf den Demenz-Kontext festgelegt. Letztendlich ist aber die ALADDIN-Technologie unabhängig von speziellen Krankheitstyp, speziellen medizinischen Skalen und speziellen Fragebogen-Typen. Die Technologie kann jederzeit rekonfiguriert und reimplementiert werden.

B2. ALADDIN SYSTEM FLYER (FOKUS) (IN ENGLISH)



ELAN
Electronic Government
and Applications

ALADDIN

Home Care System for
Efficient Monitoring of
People with Dementia



At a Glance

The ALADDIN-platform is developed to support dementia patients and carers in the everyday management of the disease at home. It is based on methodologies for efficient patient follow-up, adaptive care and early detection of symptoms to predict decline. It integrates cognitive stimulation tools for patients, decision support and management tools for clinicians.

It is an open, secure, interoperable, integrated IT-solution designed according to Service Oriented Architecture principles. The benefits are expected to lie in the prevention of emergencies, in reduction of carer burden through monitoring functions and in the maintenance of the patient's and the carer's Quality of life.

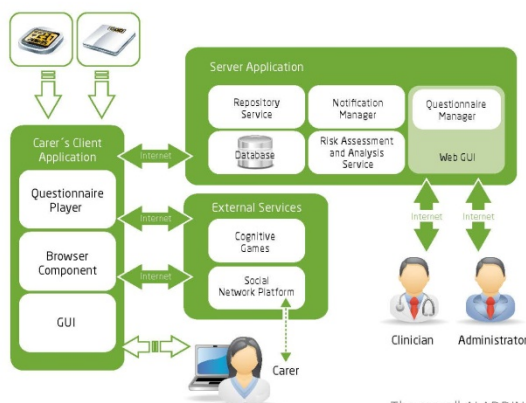
About ALADDIN

ALADDIN integrates state-of-the-art in ICT to an integrated solution for the management of dementia. The technology is supposed to support both the patients and their informal carers.

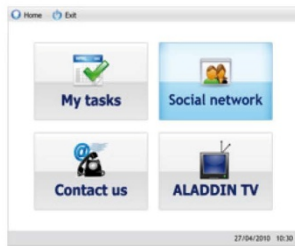
The interdisciplinary solution achieved between information scientists and clinicians can be conceived as an integrated platform enabling distant monitoring of patient status and facilitating personalized intervention and adaptive care. The ALADDIN platform is: (1) Supporting maintaining health and functional capability, through the risk assessment and the early detection of decline symptoms of the patients as well as distress signs of their carers, (2) Providing the means for the self-care and the self-management of chronic conditions, through the integration of social networking as well as educational tools, (3) Providing added value to the individual, leveraging his/her quality of life, and supporting the moral and mental upgrade of both patients and carers and, (4) Enhancing the home-as-care environment through the provision of user-friendly ICT tools for frequent, unobtrusive monitoring.

The ALADDIN-Platform consists of three parts:

- the Carer's Client Application
- the Server Application
- the External Services



The overall ALADDIN system architecture



The Start Page of the Carer's Client Application which gives access to the various system services



Institute of Communication & Computer Systems, Greece



Alma Mater Studiorum - Università di Bologna, Italy



The National Hospital for Neurology & Neurosurgery, United Kingdom



Psychiatric Hospital Of Attica, Greece



Badalona Serveis Assistencials, Spain



AtoS, Spain



Aethia Srl, Italy



Contact

ALADDIN
Silke.Cuno@fokus.fraunhofer.de
+ 49 30 3463 7311
www.aladdin-project.eu

Fraunhofer Institute for Open Communication Systems
Kaiserin-Augusta-Allee 31
10589 Berlin

www.fokus.fraunhofer.de



ALADDIN - Carer's Client Application

The Carer's Client Application is used at home by carers and patients to access the services of the ALADDIN platform. Carers fill in the ALADDIN questionnaires for neuropsychological assessment from home. Physiological parameters are recorded and submitted by the carer using the application. Patient records generated through the use of the system include:

- Physiological parameters (blood pressure, body weight, activity level)
- Cognitive, behavioral & daily living assessment (neuropsychological tests)
- Medication follow-up and drug-related adverse events

Carers are also closely monitored, by filling in regularly the questionnaire about the carer's well-being, allowing the assessment of their own physical and psychological burden. The submitted data is analyzed automatically by the Risk Detection and Prediction component and warnings which are generated when an alarming condition is identified. Manual warnings can also be sent. External services, are accessed from the Carer's Client Application through an embedded web browser.

The Start Page of the Carer's Client Application gives access to:

My Tasks, leading to the list of tasks assigned by the clinician to the carer or patient for the current day,

Contact us, enabling the carer to send a warning message to the clinician requesting him/her to contact the caregiver in the near future,

Social network, opening into an embedded web browser one of the two separate bulletin boards (forums), one targeting the carers and one targeting the patients,

ALADDIN TV, containing educational material for the carers.

ALADDIN - Server Application

The Server Application is the core of the platform. It implements the basic functionalities of the platform, provides secure communication with client applications, stores the information about patients and carers, provides the possibility to exchange information with external Hospital Information Systems (HIS) and provides a web based graphical user interface for clinicians and platform administrators to interact with the system.

ALADDIN - External Services

The External Services are services provided by external web portals. There are two types of services involved: cognitive games and a social networks. The integration of these services in the platform is achieved by a web browser component in the Carer's Client Application, which opens a web page with the selected external service directly in the client application. The Social Network Service is provided by the ALADDIN platform as a web forum integrated with the core platform management of users. The provided forum can be easily replaced by any alternative social network platform.

GOALS

The ALADDIN system aims to provide the technological means as well as a novel and credible methodology for:

- Efficient patient follow-up
- Early detection of symptoms that predict decline
- Adaptive care / personalized intervention
- Networking / socialization / education / cognitive stimulation
- Prevention and relief of distress for the carer
- Decision support and disease management tools for clinicians

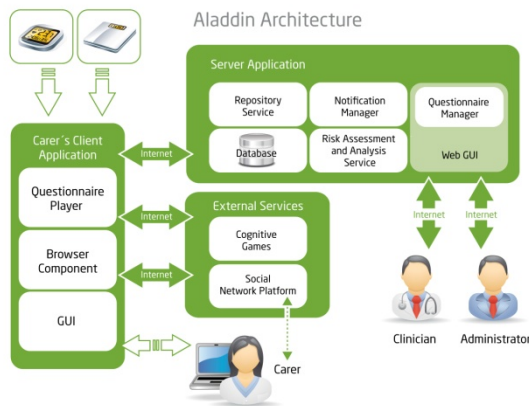
The main benefits of the platform are expected to lie in the prevention of emergencies that are caused by worsening in symptomatology, cognitive decline, behavioral aspects, overall severity and drug side effects. ALADDIN's strengths are its interdisciplinary approach implementing scientifically accepted medical scales. Furthermore it respects interoperable designs goals. The systems long termed monitoring includes not only the patient and the clinicians in the operational scenario, but also the carer. This attributes makes it unique on the market. It is independent of both physical measurement type and questionnaire type, so the technologie can be reconfigured and deployed in different context of diseases and is not specifically determined to be used only in the dementia context.

B3. ALADDIN POSTER FOR THE AAL FORUM 2011 (FOKUS)



ALADDIN

Home Care System for Efficient Monitoring of People with Dementia



Project Objective:

ALADDIN's objective is to develop a trustworthy and reliable system supporting patients with dementia and their informal carers in the management of the disease from home. Based on a set of monitoring parameters and measuring scales feeding the risk assessment component, the system aims to early detect symptoms that predict decline, avoid emergencies and secondary effects and, ultimately, prolong the period that patients can remain safely cared at home. Informal carers are also closely monitored by the system whereas additional features supporting networking, education and cognitive stimulation are also integrated.

Project Funding:

AAL JP funded project, total budget €1,97 million, funding: €1,47 million

Project Partners:

- Institute of Communication & Computer Systems, Greece
- Fraunhofer Institute for Open Communication Systems, Germany
- Alma Mater Studiorum – Università di Bologna, Italy
- Psychiatric Hospital of Attica, Greece
- The National Hospital for Neurology & Neurosurgery, UKW
- Badalona Serveis Assistencials, Spain
- Atos Research and Innovation, Spain
- Aethia Srl, Italy



ALADDIN provides the technological means as well as a novel and credible methodology for:

- Efficient patient follow-up
- Early detection of symptoms that predict decline
- Adaptive care / personalised intervention
- Networking / socialisation / education / cognitive stimulation
- Prevention and relief of distress for the carer
- Decision support and disease management tools for clinicians*

Aladdin Added Value



Contact

Project Manager: Maria Haritou
 Tel: +30 210 7723893
 mhar@biomed.ntua.gr

Technical Manager: Yuri Glickman
 Tel: +49 30 34637125
 yury.glickman@fokus.fraunhofer.de

www.aladdin-project.eu



ANNEX C: EVENT RELATED MATERIALS AND LIST OF PRESENTATIONS

C1. ALADDIN LIST OF PRESENTATIONS

Date / Place	Presentation title	Event name	Type	Audience	Presenter
27.01.2009 Berlin, Germany	ALADDIN - A technology pLatform for the Assisted living of Dementia eIDerly INdividuals and their carers Eine Technologie-Plattform für Betreutes Leben von Demenzkranken und für ihre Betreuer	2 nd German AAL Convention in Berlin	Exhibition & workshop	National, AAL related, Mixed	F. Apitzsch
April 2009 Berlin, Germany	ALADDIN - A technology pLatform for the Assisted living of Dementia eIDerly INdividuals and their carers	VDI/VDE	Workshop	National	F. Apitzsch
10-12.06.2009, Salamanca, Spain	ALADDIN, A technology platform for the assisted living of dementia elderly Individuals and their carers	IWAAL'09	Conference	Scientific, International, Technical	K. Perakis
29.09-01.10.2009, Vienna, Austria	The ALADDIN project	AAL Forum 2009	Conference	International, AAL related, Mixed	M. Haritou
25.01.2010, Berlin, Germany	„ALADDIN – Eine Technologieplattform für altersgerechte Assistenzsysteme für Demenzkranke und ihre Pfleger“,	3 rd German AAL Convention in Berlin	Exhibition & workshop	National AAL related, Mixed	S. Cuno
23-25.06.2010, Samos, Greece	Requirements and Specifications' Analysis for a Monitoring System to Support the Self-management of Dementia Patients at Home	PETRA2010	Conference	Scientific International, Technical	S. Xefteris
25-27.05.2011, Crete, Greece	Enabling Risk Assessment and Analysis by Event Detection in Dementia Patients Using a Reconfigurable Rule Set	PETRA2011	Conference	Scientific International, Technical	S. Xefteris
27-2.05.2011, Kavala, Greece	Telematics Applications in the Health Care Sector	2 nd Pan-Hellenic Conference in Biomedical Technology and Medical Devices	Conference	National, Technical, Medical	M. Haritou

25-28.09.2011, Lecce, Italy	ALADDIN: A home care system for the efficient monitoring of elderly people with dementia	AAL Forum 2011	Conference	International, AAL related, Mixed	M. Haritou
12-14.10.2011 St. Petersburg, Russia	ALADDIN - система эффективного мониторинга и ухода на дому за пациентами с деменцией - ALADDIN - effective monitoring system and home-based care for patients with dementia	XIV All-Russian Joint Conference "Internet and Modern Society» (IMS 2011)	Conference, Workshop	Scientific, Russian IT	Y. Glikman
28.10.2011 Florence, Italy	Management, Monitoring and Supporting Dementia Patients at Home by ALADDIN	eChallenges	Conference	Scientific, European IT Research	S. Cuno
28.10.2011, Florence, Italy	Describing and Identifying Business Models from Generic Value Chains for Technology Systems	e-Challenges	Conference	International, mixed	D. Field
17.11.2011, Düsseldorf, Germany	Das ALADDIN-System zur Pflege und effizientem Monitoring des Krankheitsverlaufes von Demenz in der häuslichen Pflegeumgebung	Medica 2011, Medica Vision Forum organised by the German Federal Research Ministry	Fair and Symposium	Medical Fair, Scientific Forum	S. Cuno
02.12.2011, Barcelona, Spain	(workshop program and presentation titles are provided in Annex E of this document)	ALADDIN Final Workshop	Workshop	Mostly Spanish, Medical, Health Authorities	M. Haritou, Y. Glikman, J.R. Llopart, M. Jahanshahi, D. Field
19.12.2011 Moscow, Russia	Innovation Centre Skolkovo Information event with the Fraunhofer – Gesellschaft Co-operation opportunities with Fraunhofer FOKUS	DWIH - Fraunhofer – Workshop Innovation Centre Skolkovo Information event with the Fraunhofer – Gesellschaft Moscow	Workshop	Scientific	S. Cuno, Y. Glikman

C2. ALADDIN TEAM IN EVENTS



The ALADDIN stand at the AAL Project Village (AAL Forum 2010-Odense, Denmark)



ALADDIN poster at the poster exhibition area at the AAL Forum 2011 (Lecce, Italy)

ANNEX D: ABSTRACTS OF ALADDIN PUBLICATIONS

ALADDIN, A technology pLatform for the Assisted living of Dementia eLDerly INdividuals and their carers

Konstantinos Perakis¹, Maria Haritou¹, Dimitris Koutsouris¹

¹ Institute of Communication and Computer Systems, National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

In: *the International Workshop of Ambient Assisted Living 2009 (IWAAL'09)*, S. Omatu et al. (Eds.): IWAAN 2009, Part II, LNCS 5518, pp. 878-881, 2009, Salamanca, Spain, June 10-12, 2009.

Abstract. Alzheimer's disease, the most common form of cortical dementia, is a degenerative brain disease for which there is no known cure but only a symptomatic therapy. Experts estimate that 26.6 million people worldwide had Alzheimer in 2006, which would multiply by four by 2050. The scope of the present paper is to present ALADDIN, A technology pLatform for the Assisted living of Dementia eLDerly INdividuals and their carers, which aims at supporting maintaining health and functional capability, providing the means for the self-care and the self-management of chronic conditions, providing added value to the individual, leveraging his/her quality of life, while at the same time supporting the moral and mental upgrade of both the patients and their carers, as well as enhancing the home-as-care environment through the provision of tools for frequent, unobtrusive monitoring, via the development of user-friendly ICT tools.

Keywords: Alzheimer, assisted living, dementia, mental health, quality-of-life, self-care, self-management.

Requirements and Specifications Analysis for a Monitoring System to Support the Self-management of Dementia Patients at Home

Stefanos Xefteris¹, Maria Haritou¹, Konstantinos Tserpes¹, Alessandro Serretti², Josep Ramon Llopart³, Raffaella Calati², Theodora Varvarigou¹

¹ National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

² University of Bologna, V.le Carlo Pepoli 5, 40123 Bologna, Italy

³ Badalona Serveis Assistencials, Plaça Pau Casals 1, 08911 Badalona, Spain

The 3rd International Conference on Pervasive Technologies Related to Assistive Environments (PETRA2010), Samos, Greece, 23-25 June 2010

Abstract. Telemedicine systems are nowadays making significant advances in healthcare by decentralizing it, offering innovative services to patients and doctors worldwide, and making the application of medicine more efficient and cost-effective in a plethora of its subfields. There is although a field that has not yet been successfully coped with, even though it induces a significant burden, both socially and financially. This field includes both patients suffering from dementia, as well as their carers, who run the risk of developing depression symptoms themselves and who must face social withdrawal and heavy additional private costs. ALADDIN is a technology platform that intends to progress "state-of-the-art" in integration of existing technological solutions. ALADDIN aims to develop and validate an innovative model/technology for health promotion, risk assessment, prevention and sustainable impact of self management tools and education for patients suffering from dementia and their caregivers. In this paper the authors present the main services of the ALADDIN platform, the user requirements and ALADDIN's functional specifications.

Keywords: Dementia, Assisted Living, Alzheimer, quality of life, non-obtrusive monitoring, cognitive states, e-health and assistive infrastructures, risk analysis

Enabling Risk Assessment and Analysis by Event Detection in Dementia Patients Using a Reconfigurable Rule Set

Stefanos Xefferis¹, Aggelos Androulidakis¹, Maria Haritou¹, Andrey Baboshin², Yuri Glickman², Francesco D'Andria³, Konstantinos Tserpes¹, Theodora Varvarigou¹

¹ Institute of Communication and Computer Systems, National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

² Fraunhofer FOKUS, Kaiserin-Augusta Allee 31, 10589 Berlin, Germany

³ ATOS ORIGIN, Av.Diagonal 200, 08018 Barcelona, Spain

The 4th International Conference on Pervasive Technologies Related to Assistive Environments (PETRA2011), Crete, Greece, 25-27 May 2011

Abstract. Chronic mental illnesses pose a great burden on the lives of citizens worldwide. In modern health-care, decentralization and enabling the self management of patients at home are crucial factors in improving the everyday lives of patients and the people close to them. People in general tend to dislike obtrusive monitoring on their daily activities, so how can we implement a platform that can provide clinicians with adequate and concise information on their patients health status and at the same time be unobtrusive and easy to use. Moreover, how can we make such an unobtrusive system capable of providing the doctor with high impact warnings on the patient's health status only when it is needed, thus relieving him of unnecessary workload? In this paper, the authors present a reconfigurable Event Detection mechanism used in the ALADDIN platform for Risk Assessment and Analysis.

Keywords: Dementia, Assisted Living, Quality of Life, Non-Obtrusive Monitoring, Cognitive States, e-health and Assistive Infrastructures, Risk Analysis.

A Technology Platform for the Assisted Living of Dementia Elderly Individuals and their Carers

I. Sáez¹, M. Oliveras¹, M. J. Ciudad¹, I. Fort¹, J. R. Llopart¹, M. Haritou² and Aladdin Research Consortium

¹ Badalona Serveis Assistencials, Plaça Pau Casals 1, 08911 Badalona, Spain

² Institute of Communication and Computer Systems, National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

At: The 7th Congress of the European Union Geriatric Medicine Society (EUGMS), 28 September 2011, Malaga, Spain

Abstract.

Introduction: The great impact on daily life activities of patients suffering from Alzheimer disease, as well as on their relative is wellknown. Aladdin is a European project funded by European Commission that aims to improve quality of life of patients and their carers through the use of a technologic platform installed at home.

Methods: A randomised controlled trial has been started since 9th May 2011 with 60 participants divided in two groups of 30 controls and 30 cases, spread among 3 pilot sites in Greece, England and Catalunya (10 + 10 participants). The main objective is to improve quality of life and secondary outcomes are delaying nursing home admission and detecting behaviours disorders and burden of carers. Mild to moderate dementia reaching MMSE > 9 and Barthel index > 35 has been used as inclusion criteria. Intervention has begun with monitoring of vital signs, register of physical activity and the assessment of behaviour disorders following the Memory and Behaviour Checklist, as well as Zarit scale. The technologic platform will allow patients perform cognitive activities and the monitoring and assessment by the specialised team along 6 months. Impact on quality of life, clinical impact and user satisfaction are items registered as well.

Conclusion: Thanks to the changes searched by this tool in the assessment and monitoring of dementia patients and their carers, quality of life and burden of the carers are outcomes expected to improve.

Management, Monitoring and Supporting Dementia Patients at Home by ALADDIN

CUNO, Silke¹ and Yuri GLICKMAN¹, Andrej BABOSHIN¹, Maria HARITOU², Alessandro SERRETTI³, Aggelos ANDROULIDAKIS², Raffaella CALATI³

¹ Fraunhofer FOKUS, Kaiserin-Augusta Allee 31, 10589 Berlin, Germany

² Institute of Communication and Computer Systems, National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

³ University of Bologna, V.le Carlo Pepoli 5, 40123 Bologna, Italy

At: The eChallenges e-2011 Conference Proceedings, Paul Cunningham and Miriam Cunningham (Eds), IIMC International Information Management Corporation, 2011, ISBN: 978-1-905824-27-4, Copyright © 2011

Abstract. The paper presents the ALADDIN-platform developed to support dementia patients and their carers in the everyday management of the disease at home. The platform is based on the credible methodologies for efficient patient follow-up, adaptive care and early detection of symptoms to predict decline. It integrates a socialisation tool for carers and patients, cognitive stimulation tools for patients and decision support and management tools for clinicians. It is an open, secure, interoperable, integrated IT-solution designed according to Service Oriented Architecture principles. The benefits of this technology are expected to lie in the prevention of emergencies, in reduction of carer burden through management and monitoring functions and in maintenance of the patient's and carer's Quality of life.

A technology platform for a novel home care delivery service to patients with dementia

M. Haritou¹, Y. Glickman², A. Androulidakis¹, S. Xefteris¹, A. Anastasiou¹, A. Baboshin², S. Cuno², D. Koutsouris¹

¹ Institute of Communication and Computer Systems, National Technical University of Athens, 9 Iroon Politechniou str., 15773, Athens, Greece

² Fraunhofer FOKUS, Kaiserin-Augusta Allee 31, 10589 Berlin, Germany

Special Issue on Ubiquitous Computing in Healthcare (UCH), Journal of Medical Imaging and Health Informatics, (accepted, in Press).

Abstract. Chronic illnesses impose a great burden on the lives of citizens worldwide. In modern health-care, decentralization, dehospitalisation and self management of diseases at home are crucial factors for improving the every-day life of the patients and the people close to them. People in general tend to dislike obtrusive monitoring on their daily activities, so the challenge for home care solutions is to implement systems that provide clinicians with adequate and concise information on their patients' health status while at the same time be unobtrusive and easy to use. Moreover, such systems must ensure that they produce high impact warnings on the patient's status only when it is needed, in order to relieve clinicians from unnecessary workload and become a real tool for decision making and efficient patient follow-up. ALADDIN's objective is to develop a trustworthy and reliable system supporting patients with dementia and their informal carers in the management of the disease from home. Based on a set of monitoring parameters and measuring scales feeding a reconfigurable Event Detection mechanism used for Risk Assessment and Analysis, the system aims to early detect symptoms that predict decline, avoid emergencies and secondary effects and, ultimately, prolong the period that patients can remain safely cared at home. Informal carers are also closely monitored by the system whereas additional features supporting networking, education and cognitive stimulation are also integrated along with decision support and patient management tools for the treating clinicians. The platform has been built based on credible methodologies for efficient patient follow-up, risk detection and adaptive care. It is an open, secure, interoperable, integrated IT-solution designed according to Service Oriented Architecture principles. The benefits of this platform are expected to lie in the prevention of emergencies, in reduction of carer burden and in maintenance of the patient's and carer's quality of life.

Keywords: Home Care, Dementia, Risk detection, Decision Support Systems, Ambient Assisted Living

ANNEX E: EHEALTH WORKSHOP ORGANISED BY THE DEPARTMENT OF HEALTH OF THE CATALAN GOVERNMENT

MORNING SESSION PROGRAM



L' eSalut en el marc dels projectes de la UE

PROGRAMA

Data: Divendres **2 de desembre** del 2011 de 09:00 a 14:00.

Lloc: **Sala d'Actes de l'AIAQS**, carrer Roc Boronat 81 – 95

09.30h Benvinguda i introducció a la sessió. Reptes i oportunitats pel desenvolupament de la innovació en salut. **Sr. Joan Cornet**, President Executiu Fundació TicSalut.

09.45h Innovació en l'abordatge del malalt crònic. Les TIC el què tenim i el què ens falta. **Dr. Carles Constante**, Director General de Regulació, Planificació i Recursos Sanitaris. **A confirmar.**

Lliçons del pla d'implementació dels projectes:

- Renewing Health. **Sr. Ignasi Garcia-Milà** Fundació TicSalut
- Rehabilitation Game System, fites assolides i el repte de la transferència. **Sra. Carme Buisan** Funding Development i Management UPF
- Regional Telemedicine Forum, les bones pràctiques europees.

10.45h Avaluació del risc: el camí per la planificació de serveis per la gent gran. **Dr. Antoni Sicras**, BSA

- Projecte ALADDIN **Sr. Dani Atos** i **Dr. Ignasi Saez**, BSA
- Projecte Home Sweet Home. **Dr. Ignasi Saez**, BSA

11.30h Pausa cafè. Demostració Projecte ALADDIN

12.00h Taula rodona : el agents del territori i el seu rol en el desenvolupament de serveis innovadors de salut. La telemedicina com una oportunitat per la integració de serveis en el territori i un benefici per a la indústria. Els reptes. Moderador **Sra. Ma. Àngels Cabezas**, Gerent Badalona Serveis Assistencials

- L'administració: **Dr. Enric Agustí**, Gerent Regió Sanitària Barcelona
- L'empresa de serveis: XXX, Asmedit
- El proveïdor de serveis: **Dra. Glòria Palomar**, Directora Gestió Fundació Parc Taulí

12.45h La col·laboració pública-privada en els projectes d'innovació en salut. **Sr. Carlos Sisternas**, Director FENIN Catalunya

13.00h Les estratègies del Departament de Salut. **Dr. Joan Guanyabens** Coordinador General de les TIC Departament de Salut i Conseller Delegat de l'Agència d'Informació, Avaluació i Qualitat en Salut

13.15h Resum i conclusions de la Jornada. **Dr. Joan Guanyabens**

[Formulari Inscripció](#)



Amb el suport de:



Agència de Gestió d'Ajuda Universitària i de Recerca

TicSalut
www.ticsalut.cat

AFTERNOON SESSION – ALADDIN WORKSHOP PROGRAM

2 December 2011	
ALADDIN: PAVING THE WAY FOR FUTURE EXPLOITATION FINAL CONFERENCE OF THE ALADDIN PROJECT	
15:00	Registration
15:15	Opening of the workshop <i>Josep Ram3n Llopart</i>
15:30	Aladdin in the context of the European markets for the elderly <i>Maria Haritou</i>
15:45	The benefits and challenges of integrating telemedicine in existing healthcare systems <i>Marjan Jahanshahi</i>
16:00	Technical realisation: difficulties, compromises and further improvements <i>Yuri Glickman</i>
16:20	The road ahead for sustainability: public versus private <i>Daniel Field</i>
16:40	Service models for ageing society as a core for future economical clusters <i>Josep Ram3n Llopart</i>
17:00	Closing of the event

THE WORKSHOP WILL TAKE PLACE AT THE AGÈNCIA D'INFORMACI3, AVALUACI3 I QUALITAT EN SALUT PREMISES: ROC BORONAT, 81-95



ALADDIN WORKSHOP: (a) PANEL, (b) ALADDIN CONSORTIUM



ALADDIN-System Demonstration at the Final Project Workshop