



EIE-06-085 SOLPOOL

Intelligent Energy  Europe

Work Package 5: Evaluation

D19: guideline, continuation SOLPOOL promotion

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1. Introduction

The main objective of the SOLPOOL project was to develop and implement campaigns for the increased use of solar thermal systems for the heating of outdoor swimming pools. The campaigns, carried out from March 2008 until May 2009, targeted the owners and operators of swimming pools, as well as installers and distributed of solar energy devices in Czech Republic, France, Germany, Greece, Hungary, Italy and Slovenia. The project partners were responsible of organizing all the workshops and dissemination activities at national and regional level, having a common European approach for the promotion of solar energy for the heating of outdoor swimming pools, strategy developed during the first part of the project.

During the execution of the project SOLPOOL a set of dissemination materials, planning tools and guidelines were developed and distributed among the key stakeholders. These include: the **Impact Advisor**, decision-making tool to estimate the effectiveness and economic impact of the use of solar energy for outdoor pool heating; **17 best practices fact sheets** examples across Europe, containing the characteristics of the swimming pool and the description of the solar system installed; **8 information posters** (in English, Czech, French, German, Hungarian, Greek, Italian and Slovene) that have been displayed in more than 200 swimming pools in Europe; **an information flyer** containing the information about the project, the economic and environmental benefits of installing solar systems and the available technologies; **a manual for installers, planners and operators/owners** in 8 languages, describing the main components, the system, the installation and the costs; **a manual for end-users of solar heated swimming pools**; and the SOLPOOL web page containing information of the project, the pdf. version of the above mentioned documents as well as the impact advisor, a data base of stakeholders, links to national web pages and a list of awarded swimming pools.

It is estimated that SOOLPOOL directly reached about 1.500 swimming pools in the targeted countries, with more than 10.000 hits in its web-page of interested public looking for information related to solar heating in outdoor swimming pools. However, the dissemination activities are planned to continue after the project end, and therefore a plan for further dissemination of the knowledge and a continuous spreading of the message is needed with the aim of supporting the partners of SOOLPOL in their future mission. This document has been planned to serve as a guidelines for future promotion activities, and has been prepared based on the lessons learned during the 30 months of this venture. The idea is to ensure the sustainability of the project after the end, guaranteeing that the efforts of the SOOLPOL partners in producing the material and building-up the network of stakeholders are not in vain. Applying the strategies proposed and following the suggestions given will ensure that the message of SOOLPOL, promoting the use of solar energy systems in heating outdoors swimming pools, continues to be brought to the target regions.

2. Future use and distribution of the main dissemination and training material

Thanks to the joint efforts of the project partners, the project SOLPOOL was able to deliver dissemination and training material of great quality, which has the potential to be further distributed among the other stakeholders maximizing the impact of the project after May 2009, when the project ended. The following section summarizes the main products of SOLPOOL, describing in a broad sense the possible channels of distributions and the main targeted audiences.

Impact Advisor

The Impact Advisor is a basic decision tool for policy makers or investment decision makers to pursue the idea of solar pool heating. The simple excel based Impact Advisor software tool provides the following technical capacities: calculation of dimensioning, building and operation costs, economic gains, energy savings and reduced CO₂-emissions for solar pool systems against the existing or conventional heating. The impact advisor is available in English, German, Slovenian, French, Czech, Greek, Hungarian and Italian.



The screenshot shows the SOLPOOL Impact Advisor software interface. It includes a language selection menu, a form for entering pool details (name, address, location, pool size, solar system type), and a table of calculated results. The results table includes fields for heat outside temperature, energy consumption, energy costs, energy price, investment costs, operating costs, pay back time, emission value, and savings CO₂ emission. The interface also features logos for DGS and Intelligent Energy Europe, and a note about funding from the European Commission.

Figure 1. The SOLPOOL impact advisor

Possible channels of distribution:

-Currently there are thousands of Facebook groups related to swimming pools worldwide: more 500 containing the Spanish word “piscina”, more than 500 containing the word English “swimming pool”, more than 500 groups with the French word “piscine” and around 60 with the German words “Schwimmbaden” or “Schwimmbecken”. This shows the enormous potential of using the latest ICT tools to market the use of the Impact Advisor. The idea could be to develop and test a novel public e-awareness campaign using the latest ICT tools such as text messaging, facebook, Youtube and others mainly among young people, recognizing the enormous multiplier effect potential of these channels.

-A direct link to the Impact Advisor web link <http://www.solpool.info/2104.0.html> available at web pages of other projects, municipalities, energy agencies, associations, conferences, etc.

-Promotion of the software in fairs and exhibitions of swimming pools and renewable energies in which the partners will participate.

-Repeatedly sending invitations to the mailing lists of members of associations of swimming pools and SMEs of solar energy installers and distributors.

Key message to the stakeholder: *“It is free to download, and will help you save money in energy costs”*

Key message to the partner: *“The Advisor is on-line, be creative when promoting it!”*

SOLPOOL leaflets

Flyers dealing with basic information on solar heating of outdoor swimming pools and the objectives of the SOLPOOL project were prepared at the beginning of the project. More than 1000 flyers were produced in 8 languages, bringing information about the project and additional information technical and economic information to the stakeholders. The leaflets were distributed in the workshops and in different conferences and currently, they are available in the web page <http://www.solpool.info/2499.0.html>.



The SOLPOOL Project
SOLPOOL is an international project which aims the increased use of solar thermal systems for heating the water in open air swimming pools.

Based on a detailed status quo analysis two promotion campaigns will be prepared and performed for the main target groups:
- Owners and operators of open air swimming pools
- Installers for solar systems

Promotion materials and elements will be:
- Contact Data Bases
- Flyers
- Brochures
- CD-ROM
- Impact advisor
- Workshops and Information seminars
- Information panels

Materials, tools and dates will be found under www.solpool.info

Good reasons for using solar energy for Heating Open Air Swimming Pools

- Swimming pool heating by solar thermal systems is one of the most suitable applications
- Technical solutions are mostly easy to integrate into the existing system
- Solar installations for swimming pools are less expensive than conventional heating systems
- Costs for maintenance will rise exponential in the near future

Expected Results
It is estimated that 10 % more of the outdoor pools in the participating regions will equip their pools with a solar thermal system, what means a significant improvement of the energy efficiency of the outdoor pool stock by the use of renewable energies.

Join and benefit from the SOLPOOL Project:

- Get information for technical solutions
- Find your installer in the data base
- Use the Impact advisor as planning tool
- Get support by the information panels
- Receive newsletters
- Be part of the stakeholder pool

Stakeholder Pool
To join the project's Stakeholder Pool please register on:
www.solpool.info/1798.0.html

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SOLPOOL
Solar Energy Use in Outdoor Swimming Pools

www.solpool.info

Intelligent Energy  Europe

DGS
Deutsche Gesellschaft für Sonnenenergie e.V.
International Solar Energy Society, German Section

Figure 2. The SOLPOOL leaflet in English

Possible channels of distribution:

-The basic problem with the distribution of the hard copy of the leaflet is the costs for printing. However, it must be taken into account, that the flyers could be printed in simply A4 paper. Printing the flyer in recycled paper will give a “green imagine” to the message, and it will help the partner to save costs of producing it.

-Usually the partners assist to conferences and fairs within their normal day-to-day activities. These events are always a place to keep bringing the message. Meetings with other partner

organization could be also an option for spreading the materials, especially if the partners have access to a further network of partners.

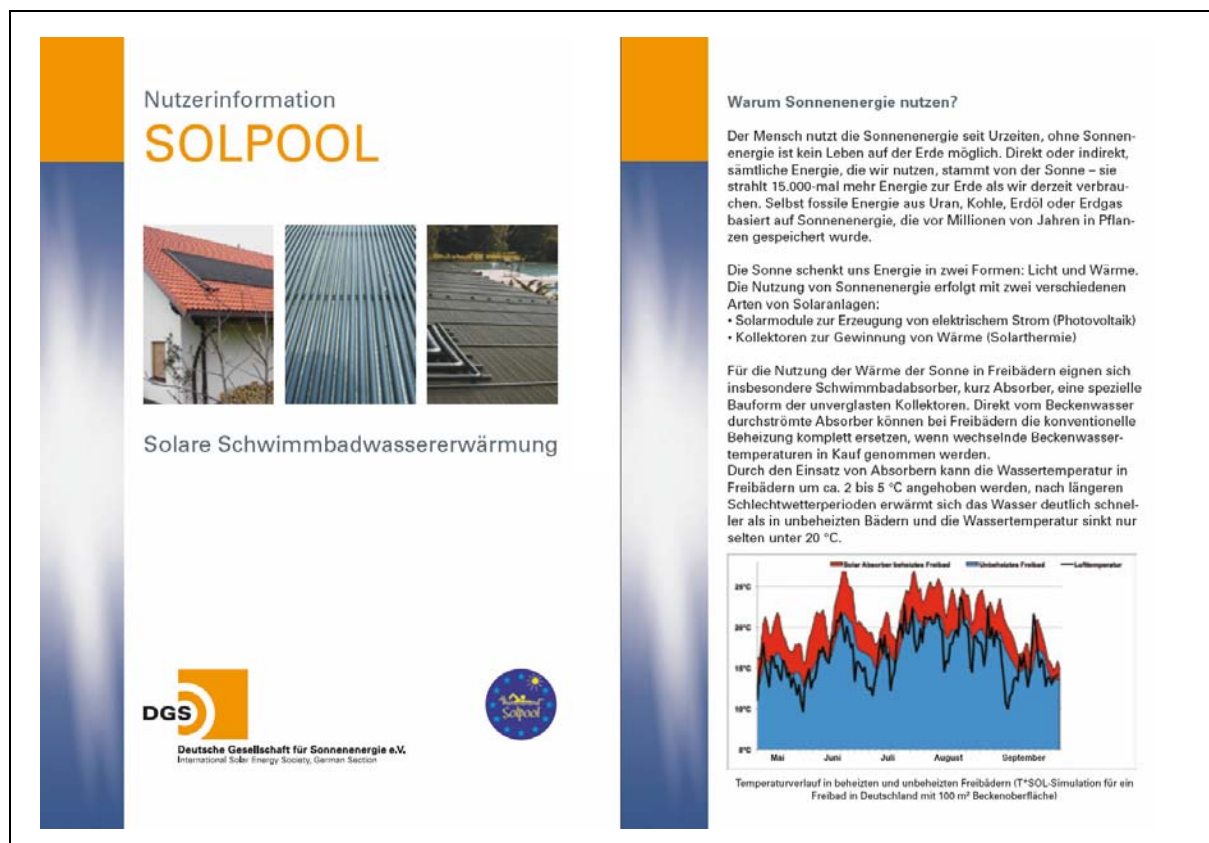
-Repeatedly sending the pdf version of the flyers to the mailing lists of members of associations of swimming pools and SMEs of solar energy installers and distributors.

Key message to the stakeholder: “Just a few lines to get an inside of how to save costs in swimming pool heating”; “Bath in renewable warm water”.

Key message to the partner: “Just a few flyers in the briefcase do not weight that much”.

Manuals for end-users and manuals for installers and operators

Two types of manuals were prepared in the frame of SOLPOOL, targeting end-users, and installers and operators. The first manual, a booklet of 12 pages intended for end-users, describes the concept of solar energy, its advantages for heating outdoor swimming pools, the types of absorbers, the typical design, the basic requirements for implementation, planning and dimensioning, costs and yields, options for national financing, and the “5 steps to a gut solar system”. The second manual, a booklet of 16 pages, includes the sections mentioned above plus more technical information, as it was produced for installers and operators, such as the components of solar thermal systems for outdoor swimming pools, available concepts/designs, the differentiation among systems, installation, operation and maintenance. The manuals produced in 8 languages are available in pdf format for download from the website <http://www.solpool.info/2499.0.html>.



Nutzerinformation
SOLPOOL

Solare Schwimmbadwassererwärmung

DGS
Deutsche Gesellschaft für Sonnenenergie e.V.
International Solar Energy Society, German Section

Warum Sonnenenergie nutzen?

Der Mensch nutzt die Sonnenenergie seit Urzeiten, ohne Sonnenenergie ist kein Leben auf der Erde möglich. Direkt oder indirekt, sämtliche Energie, die wir nutzen, stammt von der Sonne – sie strahlt 15.000-mal mehr Energie zur Erde als wir derzeit verbrauchen. Selbst fossile Energie aus Uran, Kohle, Erdöl oder Erdgas basiert auf Sonnenenergie, die vor Millionen von Jahren in Pflanzen gespeichert wurde.

Die Sonne schenkt uns Energie in zwei Formen: Licht und Wärme. Die Nutzung von Sonnenenergie erfolgt mit zwei verschiedenen Arten von Solaranlagen:

- Solarmodule zur Erzeugung von elektrischem Strom (Photovoltaik)
- Kollektoren zur Gewinnung von Wärme (Solarthermie)

Für die Nutzung der Wärme der Sonne in Freibädern eignen sich insbesondere Schwimmbadabsorber, kurz Absorber, eine spezielle Bauform der unverglasteten Kollektoren. Direkt vom Beckenwasser durchströmte Absorber können bei Freibädern die konventionelle Beheizung komplett ersetzen, wenn wechselnde Beckenwassertemperaturen in Kauf genommen werden. Durch den Einsatz von Absorbieren kann die Wassertemperatur in Freibädern um ca. 2 bis 5 °C angehoben werden, nach längeren Schlechtwetterperioden erwärmt sich das Wasser deutlich schneller als in unbeheizten Bädern und die Wassertemperatur sinkt nur selten unter 20 °C.

Temperaturverlauf in beheizten und unbeheizten Freibädern (T*SOL-Simulation für ein Freibad in Deutschland mit 100 m² Beckenoberfläche)

Monat	Beheiztes Freibad (°C)	Unbeheiztes Freibad (°C)	Lufttemperatur (°C)
Mai	18-22	12-16	10-15
Juni	20-24	14-18	12-17
Juli	22-26	16-20	14-19
August	20-24	14-18	12-17
September	18-22	12-16	10-15

Figure 3. The SOLPOOL manual for end-users in German

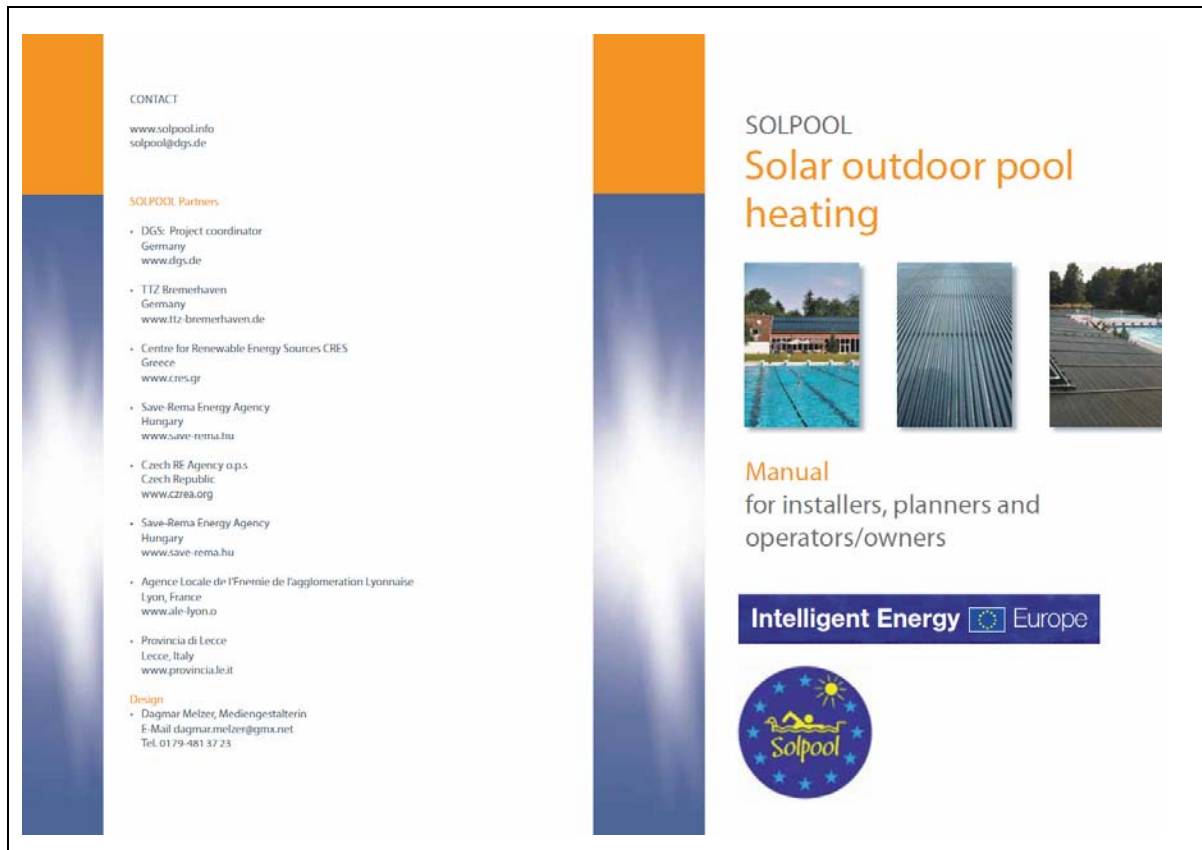


Figure 4. The SOLPOOL manual for installers, planners and operators/owners

Possible channels of distribution:

-Printing the manuals using the own funds of the partners would be an unrealistic expectation; therefore, further financing means are to be planned. The most successful way to sponsorship the production of the manuals in the future is making it an advertising business. Selling the advertising spot in the manual, in a way that companies distributing and implementing solar systems promote their business, is a win-win deal.

-Distribution of the manuals to planning and implementing companies, engineering offices, suppliers and distributing SMEs, since they receive visitors interested on swimming pools or renewable energies.

Key message to the stakeholder: *“Don’t you know how to start your solar energy system in your swimming pool? Here you will find the information that you need!”*

Key message to the partner: *“Make sure you distribute the already printed manuals which are laying in your desk”.*

Best practice examples

Best practice sites and case studies were checked and visited by the partners in their own countries. 17 Swimming pools were identified by the team across the region, in which the solar energy systems were installed. Fact sheets with information about the swimming pool

and the technology implemented were prepared. Currently these sheets, in different languages, are ready to download at <http://www.solpool.info/2268.0.html>.

Outdoor Pool Borssum in Emden



The energy demand of the outdoor pool Borssum in Emden was reduced by almost 85% due to the use of a 1900 m² absorber plant for pool water heating and a 15.5 m² flat plate collectors for service water heating. The average poolwater temperature is ensured during the whole season due to the use of a heating pump during bad weather days. This solar plant serves not only the outdoor pool but also a neighbouring super market. Thus the produced solar energy is used not only in the pool season but all over the year.

Installation: Solaranlagen Lange GmbH
Planning: Claus-Dieter Büscher
Operator and Pool: GMF mbH & Co. KG

Swimming Pool and Solar System	
Year of installation	2001
Pool surface area and volume	1.020 m ² , water depth 1,81 m – 2,03 m
Tube absorber surface area	875 m ² , water depth 0,90 m – 1,25 m
Flat plate collector surface area	1900 m ²
Absorber type	Solarflex
Auxiliary heating system	360 kW condensation boiler, 360 kW heating pump
Specific yield	74,0 kWh/m ² /a
Energy savings	ca. 1.300.000 kWh gas per year
Environmental gain	ca. 320 t CO ₂ per year
Investment costs including the heat pump	360.000,00 EUR (incl. planning and installation)
System costs	125 EUR/m ² absorber area without heating pump and other technical measurements
Operation cost savings	ca. 38.000,00 EUR per year



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Freibad Borssum in Emden

Description of the system

Renewable energies can generate profitable solutions through a clever management. A good example of this is the open swimming pool of Borssum in Emden. The originally installed heating system to warm the outdoor pool water became obsolete and eventually it had to be changed. The optimization of the budget through the reduction of energy costs was a major factor to consider for the new heating system and therefore, it was decided to implement a solar-energy system. The whole project was designed by an Engineering consulting firm in Emden under the supervision of Mr. Claus-Dieter Büscher in the year 2000, he had already been in charge of implementing a solar absorber system in the community outdoor pool of van Ameren in Emden. The new system achieved a 50% of energy costs saving in the first year. Two main aspects must be considered before the installation of a solar system: the technical feasibility and the economic viability. After a first assessment it was clear that both points were fulfilled for the outdoor pool of Borssum. The total investment costs amounted to 350.000 €, which were paid off in a period of 9 years through the energy savings achieved by the solar energy system. In May 2002 the solar energy system was put into operation. Through an optimal system design, 95% of the previously used natural gas is being saved each year, in addition to 320 Tonnes of CO₂. The pool water is warmed up with a 1.800 m² absorber system, 500 m² of absorbers being installed on the roof of the pool premises and 1400 m² on the roof of a neighbouring supermarket. Under bad weather conditions it might be the case that the 54 km long absorber pipeline system to warm the pool water up to the target temperature of 23°C. In such a case, a heat pump is used as auxiliary energy source. The heat pump and absorber system combination achieves a very good coefficient of performance (up to 6) for the heat pump. The water for the showers is heated with the help of a 12,5 m² solar collector system. The implemented solar system has covered for the last 5 years not only the energy needs to warm up the pool water, but also the heating needs of the neighbouring supermarket. This means that the energy produced from the system is used all year round. The special characteristic of the implemented system is its interactive use. The absorbers lead the sun heat away from the roof of the supermarket, which implies a reduction in the supermarket energy need for air conditioning purposes in hot summer days. The whole project has significantly reduced the energy costs of the Borssum outdoor pool and subsequently it has helped to stabilize the admission fee over the years. Therefore, the slogan of the project developers becomes a reality. Solar system = Social system.



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Ξενοδοχείο Ευρώπη



Το ξενοδοχείο "Europa Resort" βρίσκεται στο Ρέθυμνο, Κρήτης. Κυριώς εστιάζεται τον τουρισμό, με χωρητικότητα 45 κλινοκλίκων και 11 δωμάτια. Το 2001 η SOLE S.A. εγκαθίσταται στο ξενοδοχείο για μονάδα θέρμανσης (απόλυτη χρήση) και κολυμβητικές δεξαμενές με χρήση ΓΗΣ. Η εγκατάσταση για τη θέρμανση της κολυμβητικής δεξαμενής αποτελείται από 32 m² αδιαθρακτικά συλλέκτες, που θερμαίνουν την 25 m² πισίνα. Οι ανάγκες θέρμανσης της κολυμβητικής δεξαμενής καλύπτονται εξ ολοκλήρου από το ηλιακό σύστημα.

Partners: Πύλας, Ξενοδοχείο Europa resort, Molyth SOLE S.A., Οικιστικό ηλιακό σύστημα: SOLE S.A., SunStar αδιάθρακτα συλλέκτες, Ρεθυμνάσιος, SOLE S.A.

Τεχνικά στοιχεία των ηλιακών συλλεκτών της κολυμβητικής δεξαμενής	
Επιφάνεια αδιαθρακτικού συλλέκτη (από το ηλιακό συλλέκτη)	32 m ²
Επιφάνεια αδιαθρακτικού συλλέκτη για εξωτερική θέρμανση νερού	Not known
Επιφάνεια αδιαθρακτικού συλλέκτη για εξωτερική θέρμανση νερού	25 m ²
Έτος εγκατάστασης	2001
Εγκαταστάτης	Ξενοδοχείο Europa
Τύπος συλλέκτη (λίνο)	SOLE S.A.
Αδιάθρακτα συλλέκτες (απολυτική χρήση)	Αδιάθρακτα συλλέκτες (απολυτική χρήση)
Δεν υπάρχει	1144 kWh/m ² ανά εποχή (μόνο με αδιάθρακτα συλλέκτες)
Εξοικονομούμενα kWh/έτος	36 tons πετρελίου / έτος
Παραγωγή ηλιακού νερού	11,8 tons CO ₂ /έτος
Κόστος εγκατάστασης συστήματος	1710 € (συμπερ. σχεδιασμού και εγκατάστασης)
Κόστος συντήρησης ανά έτος	53,4 €/m ²

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Europa Hotel



The "Europa resort hotel" is located in Rethymno, Crete in southern Greece. It caters for tourism, with a Capacity of 45 beds and 11 apartments. In 2001, SOLE S.A. installed a DHW solar thermal and a swimming pool heating plant. The swimming pool heating installation consist of 32 m² unglazed collectors that heat a 25 m² swimming pool. The heating requirements of the swimming pool are fully covered by the solar system.

Partners: Europa resort, Office study: SOLE S.A., Solar thermal system: SOLE S.A., SunStar unglazed collectors, Installer: SOLE S.A.

Technical data of the absorber system	
Tube Absorber surface area (for pool water)	32 m ²
Flat Absorber surface area (for sanitary water)	Not known
Pool surface area and volume	25 m ²
Year of installation	2001
Operator	Europa Hotel
System Installer - Planning	SOLE S.A.
Type of collector(s)	Unglazed polypropylene
Auxiliary heating system	None
Specific yield	1144 kWh/m ² per season (only from the unglazed collectors)
Energy savings	36 tons of oil per year
Environmental gain	11,8 tons / year of CO ₂
Costs for the solar system	1710 € (incl. planning and installation)
System costs in EUR/m ² absorber area	53,4 €/m ²

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Figure 5. Two examples of the SOLPOOL best practices in Germany and Greece in English (and Greek)

Possible channels of distribution:

-Fact sheets could be printed in recycled paper, to save in printing costs. As well as in the case of the leaflet, this will also give a “green image” to the project.

-Distribution of the fact sheets among planning and implementing companies, engineering offices, suppliers and distributing SMEs, since they receive visitors interested on swimming pools or renewable energies.

-Ensuring the promotion of the web-page among partners and colleagues. This is the main source of information, containing all the results of the project. Keeping the link of the partners organization to the SOLPOOL site, ensures the continuously visibility.

-Showing already implementing projects encourages swimming pool owners to install their own system. These sheets are, without a doubt, the presentation cards of the project. A broaden impact will be achieved if all 17 sheets are translated to the national languages, therefore it is recommended to take the time to translate them.

-Preparation of on-line “SOLPOOL best cases campaigns”. A 17 weeks on-line campaign to show, for instance every Monday, one of the fact sheets to the members of mailing-lists, could be a way of further distributing the information gathered in the sheets. The texts of the E-mails could be extracted directly from the web page, making sure that they are attractive to the audience. Perseverance is needed to make an impact.

Key message to the stakeholder: *“Energy savings in swimming pools by heating with the sun? Yes!, it is possible. Just take a look!”*

Key message to the partner: *“Integrate the best cases fact sheets to your day-to-day advocacy strategy”.*

Posters

The consortium prepared 8 information posters (in English, Czech, French, German, Hungarian, Greek, Italian and Slovene), which have been displayed in more than 200 swimming pools in Europe

Possible channels of distribution:

-Posters need to be printed in good quality to make an impact in the end-user. For that, it is required to find sustainable financing for the continuously printing of the material. The local energy agencies could be the allies for the production of the posters. Conferences of swimming pools are the best place to distribute the posters among pools owners.

-Distribution of the fact sheets among planning and implementing companies, engineering offices, suppliers and distributing SMEs, since they receive visitors interested on swimming pools or renewable energies.

Key message to the stakeholder: *“A free poster to contribute to save energy”*

Key message to the partner: *“The most posters displayed, the higher the chances to make a difference”.*

USE THE ENERGY FROM THE SUN!



SOLPOOL is a project that supports and encourages the use of solar energy applied to outdoor-swimming pool heating.

WHAT ARE THE BENEFITS OF USING SOLAR ENERGY FOR SWIMMING POOLS?

- One of the most cost-effective uses of solar energy is to heat swimming pools. Swimming pools require low temperature heat, which is where solar collectors are most efficient.
- Solar heating systems can provide up to 100% of the pool heating needs and can extend the length of the swimming season with minimal operating costs.
- The consumption of energy of fossil fuel origin is reduced, as well as the CO₂ emissions.
- Although the investment costs for solar thermal systems for outdoor swimming pools are higher than those for other conventional systems, the operating costs of the former systems are very low, which results in payback period of approximately 7 years.

YOUR ENERGY FOR YOUR HOME


Solar thermal collectors are widely used to provide domestic hot water and can provide yearly energy savings of 60% compared with energy derived from fossil fuel sources.


A solar domestic hot water system usually has a storage tank for the solar heated water along with a conventional fossil fuelled hot water heater. If there is insufficient hot water in the solar storage tank, the conventional hot water heater takes over and heats the water. Therefore, hot water is always available to the household.

The minimum requirements for a solar domestic hot water system are:

- A collector area of 1-1.5 m² per person to be mounted on the roof
- A hot water storage tank of 60 l volume per person


The average cost of the installed system is about 5,000 € (incl. installation and tax) for a family of 3-4 members and the durability of the system is 25 years minimum.









www.solpool.info

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Sončna energija – darilo narave

SOLPOOL

Uporaba sončne energije za ogrevanje vode zunanjih bazenov


SOLPOOL je projekt, ki podpira in spodbuja uporabo sončne energije za ogrevanje vode v zunanjih bazenih.

PREDNOSTI UPORABE SONČNE ENERGIJE ZA BAZENE:

- ogrevanje bazenov je ena stroškovno najbolj učinkovitih uporab sončne energije. Za bazene zadošča nizko temperaturno ogrevanje, kjer so sprejemniki sončne energije najbolj učinkoviti

- solarni ogrevalni sistemi lahko pokrijejo do 100% potreb ogrevanja bazena in lahko podaljšajo plavalno sezono z minimalnimi stroški obratovanja
- zmanjša se poraba energije iz fosilnih goriv, prav tako tudi emisije CO₂
- vračilna doba sistemov z nezastekljenimi sprejemniki je okoli 7 let

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SONČNA ENERGIJA ZA VAŠ DOM

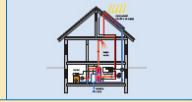


Sprejemniki sončne energije se v veliki meri uporabljajo za ogrevanje sanitarne vode in z njimi lahko lahko pripravimo tudi do 60% energije, ki bi jo porabili, če bi vodo v celoti ogrevali s fosilnimi gorivi.

Solarni sistem za pripravo sanitarne tople vode ima običajno solarni hranilnik toplote v kombinaciji s konvencionalnim grelnikom vode na fosilno gorivo. Če je premalo tople vode v solarnem hranilniku toplote, ogrevanje vode preizkusi konvencionalni grelnik vode. Tako je vedno na voljo dovolj tople vode za gospodinjstvo.

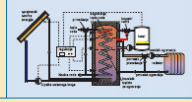
Minimalne zahteve solarnega sistema za pripravo tople sanitarne vode:

- površina sprejemnikov sončne energije vgrajenih na streho 1-1.5 m² na osebo
- hranilnik tople vode prostornine 80 litrov na osebo



in za ogrevanje prostorov:


- streha orientirana proti jugu brez senčenja
- površina sprejemnikov sončne energije na strehi 2-3 m² na osebo
- razpoložljiv prostor za hranilnik toplote prostornine 50 litrov na kvadratni meter površine sprejemnikov
- letni prihranki energije znašajo 30-40% skupnih potreb po energiji




Specifični stroški standardnega solarnega sistema:


- 600 €/m² sprejemnikov sončne energije (dena vključuje namestitve in COV). Za tak sistem je možno pridobiti povračilo subvencijno Eko sklada v višini 25% stroškov naložbe

Če vas zanima investicija v solarni sistem poiščite izvajalca na www.ape.si



Deutsche Gesellschaft für Sonnenenergie DGS e.V.
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APE Agencija za prestrukturiranje energije d.o.o.,
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SOLPOOL – Uporaba sončne energije za ogrevanje vode v zunanjih bazenih. Projekt APE, ki je sofinanciran v okviru programa inteligentna energija Evropa.

Intelligent Energy  Europe

Financiranje projekta SOLPOOL izvedla Evropska komisija v okviru programa ALTERER. Za vsako logo dokumenta so odgovorni avtorji loga. Vredila ne vsebuje imena Evropske komisije. Evropska komisija ni odgovorna za kakovostnost nadaljnje uporabe informacij.

Figure 6. The SOLPOOL poster in English and Slovene

3. Guidelines for future dissemination and exploitation of knowledge

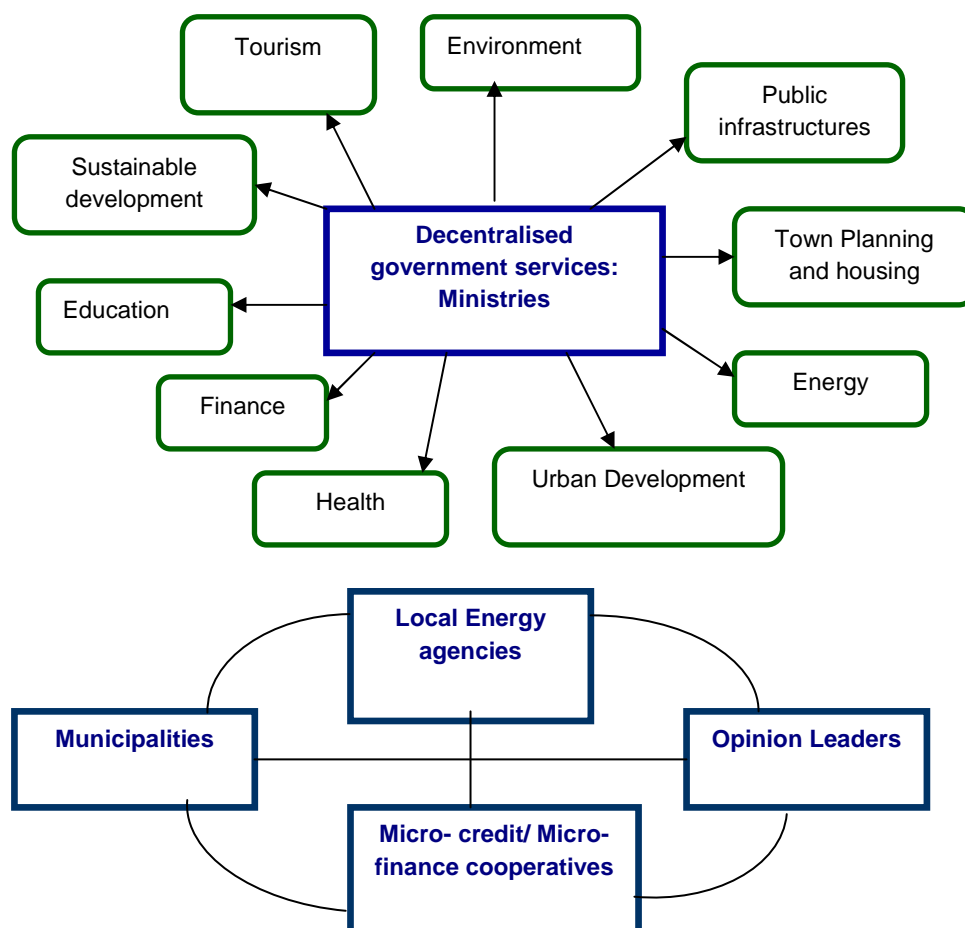
The following guidelines have been prepared based on the lessons learned during the SOLPOOL project time frame, and after the brainstorming that took place during the final meeting in Lecce, Italy from 6th to 7th of April, 2009. It aims to streamline the processes of the future dissemination activities of the SOLPOOL consortium according to a set of steps to build up further strategies of dissemination, together with suggestions that will enhance the impact of the actions.

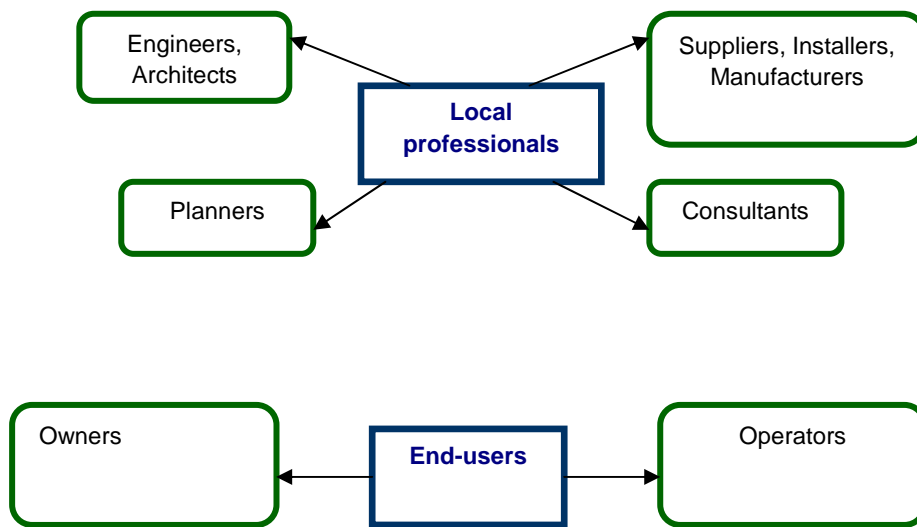
The following steps show a proposed routine to plan and implement future strategies of dissemination and exploitation of knowledge.

STEP 1: Identification of target audience

A dissemination programme should be focused on informing and training of national, provincial or divisional and local stakeholders from top to low level decision makers and actors, all those whose work support the implementation of renewable energies in swimming pools, so that they should have a vested interest in raising awareness and promote solar systems to the other stakeholders with whom they deal, enabling them to pursue solar energy projects and select the appropriate technologies.

A non-exhaustive list of target audience groups has been identified by members of the SOLPOOL consortium within the relevant authorities, decision makers, end users and professionals:





The SOLPOOL data base of stakeholders is a great place to contact different stakeholders and invite them to participate in the activities. This data base is available at: https://www.easy-business.biz/solpool/list_solpool.aspx

The screenshot displays the SOLPOOL stakeholder database interface. On the left, there are search filters for Country (All, Czech Republic, France, Germany), Institution (All, Freelancer, Governmental organisation, Media institution/company), Area of Business (All, Delivery, Supplier, Education, Engineering), and Field of work (All, Solar Thermal, Swimming pool). The main content area shows three stakeholder profiles:

- Markus Kessler Heizung - Sanitär & Solarinstallati**: Stettiner Straße 67, 17367 Eggesin. Telephone: 039779/28215. Fax: 1. Email: [redacted]. Institution: Installation, Information Services. Field of work: Solar Thermal. Area of Business: Private company.
- Öko-Energie Oberholz Produkte zur Energieeinsparung & Ressourcenschonung**: Fasanenweg 7, 63694 Limeshain-himbach. Telephone: 0180 - 39430004. Fax: 1. Email: kontakt@oeko-energie.biz. Website: www.oeko-energie.de. Institution: Installation, Planning and Consulting. Field of work: Solar Thermal. Area of Business: Private company.
- ÖkoTherm Energiesysteme GmbH**: Dotzheimerstraße 28, 65185 Wiesbaden. Telephone: 0611-89099651. Fax: 1. Email: info@oekoTherm-solartechnik.de. Website: www.oekoTherm-solartechnik.de.

Figure 7. The SOLPOOL data-base of stakeholders

STEP 2: Identification of constraints in promoting solar energy heating in swimming pools

The identification of the barriers and constraints will help to focus the dissemination campaign and design the key message. Typical constraints are: technical barriers (e.g. unreliable components, lack of trained and competent planners and installers), financial barriers (lack of incentives, high investment costs, etc.), political barriers (e.g. legal aspects, necessary permits, etc.) and societal barriers (e.g. lack of consumer awareness).

STEP 3: Setting objectives and goals

The training programme objective and expected outputs must be defined according to parameters such as training duration, the needs, financial resources available, etc. Each objective will be related to complementary outputs, activities and inputs. Outputs will reflect capacities achieved, while activities will describe the actual acquisition and development of capacities and the related changes; the objectives must be simple, achievable and verifiable.

STEP 4: Preparatory and conducting activities of dissemination and exploitation of knowledge

4.1 Preparatory activities: Any dissemination programme has to be carefully planned. Systematic preparations are required to be undertaken, followed by selection of the message, the media to be used, the didactical methodology, teaching/training material, adjusted to the target audience and the local circumstances.

4.2 Guidelines for implementation: To ensure that the material prepared within the project is used in the dissemination campaign.

-Impact Advisor

-Best practices fact sheets examples across Europe

-Information posters

-the information flyer

-the manual for installers, planners and operators/owners

For the successful implementation, the following points should be considered for the dissemination and training activities:

- Funds are a prerequisite:

- Potential obstacles and issues that should be addressed before the workshops

- All needed tools and materials should be ready.

- Stakeholders expectations of should be tackled

- Interactivity should be ensured through group working.

STEP 5: Monitoring and evaluation

Awareness rising is a long process, which needs to be planned, and monitored and evaluated over the time. To do it, a plan should be developed. This plan should include all dissemination activities, corresponding timeframes, and the involved actors with their respective roles and responsibilities.

3. Recommendations for an effective continuation of SOLPOOL promotion

The following suggestions will give the SOLPOOL partners the opportunity of carry out key activities with the potential of reaching more actors.

Reaching more stakeholders

- Increase the target audiences for dissemination, including private users, hotel operators and owners, clubs, community associations.
- Prepare regional campaigns engaging the municipalities and the chambers of commerce, as it has been shown that local/regional initiatives have stronger impact than national strategies.
- Engage the regional and local associations in the SOLPOOL strategy, as it has been shown their impact at local level.
- Encourage architects, planners, builders, construction companies and suppliers to switch to solar energy when designing and planning a new swimming pool.
- Promote within the Energy Agencies the generation of databases of swimming pools heated with solar energy, which currently are not available in none of the participating countries and regions.

Workshops and participation in conferences

- Present the official poster in conferences, exhibitions and fairs related to solar and renewable energies to wider the up-take of solar energy systems in public and private swimming pools.
- Continue participating in swimming pool conferences.

Legislative and political advocacy

- Influence politics by actively participating in the discussions of the municipal councils to include in the political agenda the need of enforcing the use of renewable energies in swimming pools.
- Bring the message and key information to town council level, which could influence not only the public swimming pool managers but also the private owners and hotel operators.
- Advocate the municipalities and local decision-makers in the wide-spreading of the outputs of SOLPOOL, by engaging them in the further printing and distribution of flyers and brochures.

Dissemination tools

- Stimulate and reinforce the use of the Impact Advisor by continuously contacting the stakeholders of the swimming pool owners and hotel associations.
- Use SOLPOOL best practice examples to convince the decision-makers to develop new financial programs in order to enhance the deployment of solar thermal technologies applied to swimming pool heating.
- Keep promoting the on-line information exchange by identifying web sites related to SOLPOOL and relevant target audiences where there could be a link to the project web page.
- Try to apply for a yearly financing line for the future dissemination activities, in order to keep on printing flyers, posters, brochures and other developed materials.
- Study the possibilities of public-private-partnerships financing models, to engage the private sector which will benefit.
- Include funding schemes for new installations of solar heating systems as one of the main dissemination tools.
- Whenever possible, offer counselling on implementation projects to interested parties.