



Energy Efficiency Solutions

Staff training

General information on the solution —

“Targets”:

- Hotel area: Guest rooms, conference rooms, general
- End-use: Lighting, space heating, space cooling, specific usage of electricity (TVs...)

Related criteria of the EU Eco-label:

Providing information and training to the staff to ensure application of environmental measures and encourage environmentally friendly behaviour is a mandatory criterion of the EU eco-label (#25).

About its implementation:

- Ease: Easy (*)
- Best moment: can be done at any time.
- Relevant initial situation: the hotel does not have any information strategy on its environmental policy towards its staff, nor does it inform staff about the actions they can take to help save energy.

Cost:

- Time to be spent on the preparation of the information supports, written procedures or manuals, and in meetings
- If the hotel is big enough: hiring a consulting firm specialized in staff training can be considered (optional)

Indicative return on investment time:

Can be <1 year (depends however on the actions taken)

Description of the solution —

Principle

Involving your staff in your energy action plan is not only essential for your energy efficiency policy to be successful, it is also a very effective way to motivate them and give a new meaning to the business! Indeed, as long as you explain to your staff that energy efficiency is part of your environmental strategy, most of them will be happy to contribute to your efforts for a more sustainable business.

To actively involve your staff, we highly recommend that you provide your staff with **information** and **training** on the actions they should take to support your efforts. And because **continuous improvement** is an important part of the hotel action plan, you should also invite your staff to provide you with their feedback and ideas to save more energy!



Suggested information/training strategy



ENERGY EFFICIENCY

Staff information and training is a highly efficient and effective measure to improve the way energy is used in a hotel

- Although it may cost a little time and money to inform and train your staff, the resulting benefits will show up in a very short time because staff behaviour has a direct impact on energy consumption (just like guests' behaviour).
- Remember also that behavioural change does not imply reduction in comfort and does not mean setting restrictions: it is about improving the way energy is used, and avoiding unnecessary energy consumption

Recommendations

What to inform and train the staff about?

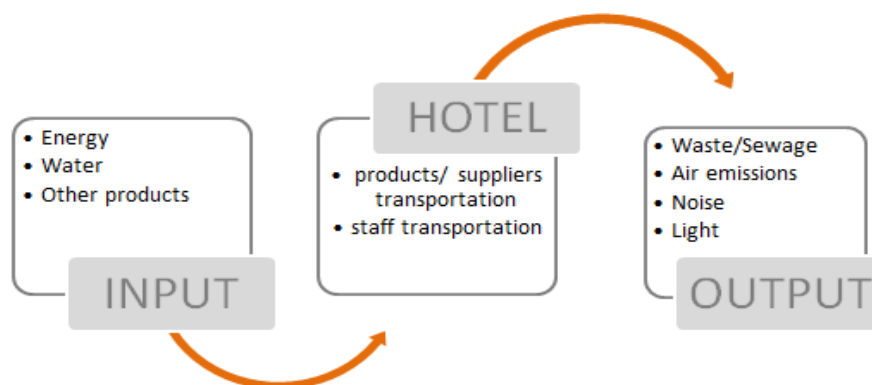
- **Environmental impact of hotels:** information should first be given on the global environmental impact of the hotel industry, in order to raise the staff's awareness. The main point here is to recognize and show that many of the services provided by hotels are resource-intensive, whether they concern energy, water, raw materials – or even natural landscapes; and that different kinds of pollution result from hotel activities, including greenhouse gas

emissions from energy use, solid waste, sewage, chemical pollution resulting from massive use of disinfectant and detergents, etc. This results in a significant ecological footprint.

You may tell your staff, for instance, that hotels have been found to have the highest negative impact on the environment of all commercial buildings, with the exception of hospitals.

- **Your hotel's environmental impact:** providing figures (or other indicators) on your hotel's environmental footprint is a very effective way to raise staff's awareness. For instance, you can inform them of the quantity of energy and water used annually, the quantity of solid waste produced, and the quantity of carbon emissions resulting from the hotel's activities (if you have had a carbon assessment made). Most of these figures will be necessary anyway if you intend to set up an environmental action plan, because making a first assessment is the starting point!
- **The hotel environmental action plan:** you should state the environmental objectives that you have adopted for your hotel (if already defined) and provide information on the actions taken (or that you want to take) to reduce its environmental impact.

Environmental aspects involved in running a hotel:





- **energy matters:** first, it is important to explain that a reduction of the hotel's energy consumption is part of your environmental strategy. You may say, for instance:

"Huge amounts of energy are used by hotel facilities worldwide, most being derived from fossil fuels, thus generating huge amounts of greenhouse gas. By improving the energy efficiency of our hotel and by avoiding waste of energy, our hotel is taking an important step to reduce its greenhouse gas emissions and to contribute to the preservation of the earth's natural resources."

You should then present the **main lines of your energy action plan**, remembering that you can act at three different levels:

1. **evaluation:** assessing the energy situation of the hotel is essential to get a view of the actions your hotel needs to take to improve its energy efficiency; it is usually a first step.
2. **organisational and behavioural change:** the implementation of an energy action plan requires the establishing of clear objectives and monitoring, which will affect all parts of your hotel; besides, for your energy policy to be successful, it is essential to involve your staff and your guests, so as to induce long-lasting change in behaviours.
3. **technical solutions:** improving the energy efficiency of a hotel also requires investment in energy efficient solutions. These solutions can be either "immediate" solutions (like changing light bulbs) or "more demanding" solutions. Whenever possible, protection of the building from the cold and hot weather should be considered (thermal insulation of the building, etc).

Possible actions that a hotel can take to reduce its energy consumption:

- Make a first assessment
- Involve your guests
- Involve your staff
- Improve efficiency of equipment
- Protect the building from the cold and hot weather



- **Targeted information and training on energy matters:** the information and training provided should be related to the daily activities of staff. If your hotel is large, you may need to provide specific information and training for each department. The table below shows examples of subjects to be addressed:



Subjects to be addressed...

... with all staff



- implications of the energy policy in terms of organisation, responsibilities...
- good housekeeping practices that should be followed:
 - try to keep doors and windows shut when the heating or air-cooling system is on,
 - adjust thermostats to a reasonable temperature in winter (around 20-22°C) and in summer (around 25-26°C),
 - turn off all unnecessary equipment (lights...).

... with staff at the reception desk (front desk)



- information to provide to arriving guests (on the environmental policy of the hotel, on its energy action plan...).

... with the cleaning staff



- good housekeeping practices for guest rooms:
 - adjust thermostats to a reasonable temperature when leaving the room (you may even stop heating and cooling if the room is unoccupied),
 - switch off lights when leaving the room,
 - turn televisions off when leaving the room (avoid sleep mode),
 - close windows when the heating system or air-conditioning system is switched on,
 - inform the maintenance staff in case of water leaks.
- good housekeeping practices for conference and meeting rooms:
 - adjust thermostats to a reasonable temperature (you may even stop heating and cooling if the room is unoccupied),
 - switch off lights if the room is unoccupied.

... with the maintenance/technical staff



- energy consumption monitoring: investigate the possibility of monitoring the energy consumption of specific equipment items (boilers...),
- regulation of heating/cooling/ventilation equipment: make sure the current regulation is appropriate, and take necessary corrective actions if not appropriate;
- maintenance and servicing of heating/cooling/ventilation equipment: make sure maintenance and servicing are as properly and regularly carried out as they should be!
- improvement of the building envelope: check if there is any deterioration of the building envelope; if maintenance work has to be done, evaluate the opportunity to improve the building envelope at the same time (prevention of air infiltration, upgrade of the thermal insulation...),
- improvement of equipment: evaluate opportunities to improve (or even change) technical equipment to gain better energy efficiency and better service.

Invite your staff to let you know if they have suggestions for ways to reduce energy consumption and improve your hotel's environmental friendliness!



How to inform and train staff? Which communication medium to use (oral communication, written procedures...)?

- The main point is to have an **active communication** (written, oral...).
- **Training sessions:** adequate training should be provided to all staff at least once a year. If the hotel is large, there may be one or two annual meetings with all staff to present and discuss the hotel's environmental action plan, and more specialized and more technical training sessions organized for each
- department. If the hotel is small, all the staff may be gathered together for presentation of general and technical information.
- **Written procedures and manuals:** depending on the size of the hotel, specific procedures and manuals may need to be written for each service. For example, for maintenance staff it is useful to have an easy-to-follow, regularly updated manual detailing the operating

methods, instructions and standard control settings for HVAC services equipment.

- **Actions for new staff:** because staff turnover is sometimes quite high in hotels, it is important to make sure that all new staff receives training within four weeks of starting their employment

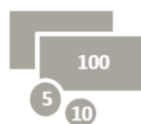
Link with other solutions in the database

- Before providing information and training to all your staff, it is recommended that you make a first assessment of your hotel's environmental impact so that you have relevant information to present. For instance, we suggest you to start by monitoring your energy consumption (**solution n°I**) and by making an energy audit of your hotel (**solution n°II**).
- Because hotel guests also have a direct impact on energy consumption, it is important to invite them to support your efforts (**see solution n°V: information to guests**).





Benefits for the hotel



Cost reduction

Energy saving

Corrective actions resulting from energy monitoring can lead to 8-10% of energy saving.

Get the right contract from your energy supplier: Knowing your energy consumption patterns will help you get the best possible energy deal in the future.



Staff involvement

Raising staff awareness

Informing your staff on hotel energy consumption is a good way to encourage them to take part in energy conservation measures.

Note that some hotels have decided to offer their staff a bonus when energy consumption is decreased.

Benefits for the environment

CO₂

Carbon emissions reduction

You will get from guest involvement but you can be certain that it won't be negligible.

Just to give an example: for a 1,000 m² hotel with an annual energy consumption of 250 kWh/m² (47% of electricity and 53% of gas), and if the French emission factors are applied, a 10% energy saving on electricity and gas represents:

4.05 teq CO₂ avoided each year

French emission factor for electricity: 84.3 gCO₂ / kWh.

French emission factor for gas: 231 gCO₂ / kWh

(Source: ADEME).

Market availability

Maturity of the solution: mature.

Type of service providers: environmental organisations working in the hotel industry sector and private consulting firms may be able to help you set up your information/training strategy (relevant only if the hotel is large enough).

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