

ERG HYDRO S.R.L.

COMPANY CERTIFICATIONS		
SAFETY	QUALITY	ENVIRONMENTAL MANAGEMENT
BS OHSAS 18001:2007 In 2020 transition to UNI ISO 45001:2018 standard	-	ISO 14001:2015 Adhesion to the EU Ecolabel Audit and Ecomanagement System

ENERGY SAVING INITIATIVES	
Energy Management System ISO 50001	Not present
Energy consumption reduction initiatives:	<p>The firm's business type means that process energy efficiency is always centre stage. Its plants underwent wholesale reconstruction and modernisation work in the 2010-15 period, ensuring optimal yields. During renovation work on the Villa Fabrizi building and the adjacent Posto di Teleconduzione the following efficiency improvement systems were introduced:</p> <ul style="list-style-type: none"> - replacement of existing light systems with LED; - introduction of new office heating systems; - automated light and heat regulation systems. <p>Photovoltaic panels were also installed on the car park canopies. Further action is planned for the near future.</p>
Renewable Energy Sources	<p>The ERG Group's renewable energy plants (wind, solar and hydro-electric) use a relatively limited amount of electricity from the grid to ensure electricity supply continuity to auxiliary and security systems.</p> <p>During normal functioning the plants produce enough electricity to satisfy all the firm's energy requirements. To minimise the environmental impact deriving from buying electricity from the grid, the ERG Group decided to supply itself with certified renewable energy on the basis of a decision by its Sustainability Committee. This policy applies to all the Group's plants, where technically possible.</p>
Water consumption reduction initiatives	<p>ERG Hydro does not consume water in its production processes. The water resources drawn from rivers and reservoirs is used to produce electricity and for cooling systems and then restored to receptors in the same quantity and quality.</p>

ENVIRONMENTAL SUSTAINABILITY AND GREENHOUSE GAS REDUCTION INITIATIVES	
Global sustainable development goals	
Global goal formalisation	<p>The group's 2018-22 Industrial Plan identified macro sustainability themes analysed from the perspective of the UN SDGs (United Nations Sustainable Development Goals) creating a direct relationship between the Plan's objectives and sustainability goals.</p> <p>In the same time frame the group's Sustainability Committee set out more detailed goals for each sustainability area (economic, environmental and social) which are then reported on annually in its DNF.</p> <p>This ongoing monitoring enables us to analyse and highlight the contribution made by our activities to the achievement of wider sustainability goals capable of generating a concrete positive impact in the world we live in for the benefit of future generations.</p>
Environmental policy document	<ul style="list-style-type: none"> - the firm's Ethics Code adopted in 2004 and now on its fifth version (approved by the firm's Board of Directors) is an expression of the firm's principles and represents its desire to implement and foster transparent dialogue. It is the cornerstone of its business development initiatives which it guides, shapes and accompanies. <p>This important document is flanked by the group's Sustainability Policy and Human Rights Policy approved by its Sustainability Committee.</p> <ul style="list-style-type: none"> - its Sustainability Policy channels the group's activities, combining its long term sustainability value creation goals with a focus on its stakeholders. The group's operational firms have also adopted the parent company's HSE policy (ERG Power Generation - which is, in turn, controlled by ERG Spa). <p>These documents are at the basis of the certified Management System (ISO 14001) which are, in turn, the basis of its EMAS Registration.</p> <p>The primary body tasked with implementing the plan is the Board of Directors which identifies the group's principles, as set out in its Ethics Code, and approves its Non-Financial Statement. Together with the Board of Directors the Sustainability Committee thus performs the following tasks:</p> <ol style="list-style-type: none"> 1. identifying the group's approach to sustainability; 2. Approving, monitoring and assessing the group's sustainability goals and CSR (Corporate Social Responsibility) action priorities;

	<p>3. Approving the Non-Financial Statement’s time frames and communication methods and CSR initiatives.</p> <p>The Sustainability Committee’s task is to make the firm’s policies operational and monitor performance periodically. Its monitoring activities as a whole take concrete form in the annual Non-Financial Declaration which is viewed by the Sustainability Committee and approved by the Board of Directors.</p> <p>- Furthermore the CSR Working Group is a cross departmental working group whose duties include: identifying reporting areas and collecting KPIs; elaborating and proposing sustainability goals and monitoring achievement; identifying initiatives and taking on board CSR demands coming from the main stakeholders; proposing CSR initiatives in the CSR sphere regarding group staff awareness raising. Lastly the CSR initiative Assessment Committee is a working group made up of staff from the operational firms, the Communication department and the Sustainability department. It analyses all local demands and selects them on the basis of the values they express and their positive local impact.</p> <p>Management and operational departments are, on the other hand, directly responsible for implementing environmental management systems and legal compliance.</p>
<p>Changes determined by sustainability strategies:</p>	<p>The ERG Group’s BP, focusing on electricity production development from alternative sources, is fully geared to environmental sustainability based on ‘good transition’ to a decarbonised economy.</p> <p>With a specific focus on ERG Hydro the hydroelectricity production business is already sustainable per se. Prior to the acquisition of the Terni hydroelectricity nucleus by the ERG Group in December 2015 we began to identify and assess ways to increase the energy efficiency of our plants such as by:</p> <ol style="list-style-type: none"> 1. Optimising the energy exploitation of water release via mini-hydro plants on environmental flows. This means maximising efficiency using the energy potentially contained at all altitudes and volumes. 2. Using biodegradable oils in turbine control hydraulic systems in order to minimise the risk of water contamination in the event of accidental spillage or breakage of hydraulic control systems.

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	<p>3. Improving plants' monitoring systems and implementing a predictive maintenance approach.</p> <ul style="list-style-type: none"> - In our business model: transition took place on a group level in 2008. Today it is fully implemented. - on company processes: optimising plant management, predictive maintenance and energy optimisation, energy efficiency via mini-hydro projects (<i>implemented</i>); - sites and infrastructure: site energy efficiency improvement, improved earthquake proofing (<i>implemented</i>); - adoption of environmentally friendly vehicles for the corporate fleet (<i>implemented</i>); - distance working systems (teleconferencing, homeworking, etc.) (<i>implemented</i>); - promotion of car pooling, use of bicycles and public transport, etc. (<i>implementation underway</i>);
Purchases and supplies	
<p>Primary raw materials used and provenance</p>	<p>ERG Hydro's production processes do not require the use of raw materials: the river water used for plant functioning is restored to them in the same quantity and quality. Other consumption material such as lubrication oils, diesel (for uninterruptible power supplies and office heating), graphite based brushes, water-based solvents for mechanical component cleaning, etc. These are used in very limited quantities and are thus irrelevant for environment impact assessment purposes. Plants use electricity to ensure continuity to auxiliary systems and security systems when plants are not functioning (when they are functioning these are self-generating). To reduce the environmental impact of its activities ERG Hydro uses certified renewable energy sources, thus eliminating CO2 emissions.</p>
<p>Environmental criteria in supplier selection</p>	<p>The following are taken into account:</p> <ul style="list-style-type: none"> - supplier social, environmental and safety certifications; - supplier proximity (short circuits) where possible.
<p>Promotion of action to get suppliers involved on environmental themes</p>	<p>The Green Procurement theme has been incorporated into the whole ERG Group's more general Sustainable Procurement project. Launched in 2019 the project's goal is to analyse certain supplier and product categories in depth for rating and sustainability purposes, identifying minimum environmental and social standards for use in supplier contracts. Supplier selection has always, in any event, taken certain environmental and safety performance elements into account (certifications, performance in the field, etc.) which</p>

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	are fundamental to supplier inclusion on the ERG Group's vendor list.
Adoption of raw material reduction initiatives	This is not a significant element as, apart from river water used for plant functioning which is in any case returned to the rivers, the hydroelectric production process does not require significant quantities of other materials.
Sustainable purchase policy for travel	We have attempted to optimise staff movement logistics in order to reduce environmental impact as far as possible. Specifically the following measures have been implemented: company cars are available for car sharing for movements between the group's sites (typically Genoa-Terni and Rome-Terni) and the group's car pool comprises hybrid cars. Videoconferencing systems are available both in special meeting rooms and at individual staff work stations using remote working software (Skype, Teams, etc.).
Sustainable purchase policy for consumables	Certain stationary and printer measures have been implemented (with firms supplying goods made with recycled raw materials being preferred). New contracts involve the use of high energy efficiency machines and offsetting carbon dioxide produced during machines' whole life cycle and recycled paper.
Sustainable purchase policy for food and drink	A Plastic Free project has enabled us to avoid consuming 2500 kg of plastic and thus avoid emitting around 15t of CO2 in 2019. An annual saving of around 26t of CO2 can be estimated. This internal project was promoted by the firm's own staff thanks to a widespread and growing awareness of sustainable lifestyle considerations and greater focus on the environmental impact of what we do. Office staff have been supplied with a mug which can be filled up at 'fountains' supplying tap water. As far as hot and cold product vending machines are concerned, plastic cups have been replaced with paper cups and bottles with biodegradable versions. This sustainable consumption model has also been extended to cleaning services involving the exclusive use of Eco-label cleaning products or PEFC and FSC certified paper items.
Production	
Green services/products	100% of the firm's overall turnover comes from the sale of 'green' products.
Product innovations designed to replace dangerous chemical substances	Where technically possible water soluble oils are used in high pressure hydraulic circuits used for turbine management and safety.

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Adoption of production process environmental certification trajectories	Company output consists of electricity generated by renewable sources. With this being the reference product this is certified with origin guarantees issued by GSE for electricity generated from renewable sources. With reference to environmental certifications, ERG Hydro has EMAS registration.
Presence of a document communicating atmospheric emissions.	N/A
Participation in environmental innovation research projects.	N/A
Waste Management	
Recycling and appropriate waste management improvement initiatives.	In 2019 the firm produced 3,104 tons of waste. 94% of this was composted. Of the remaining 6% 3.9% is sent for recycling and 2.1% goes to landfill. After several years of joint studies with Perugia University and dialogue with the appropriate authorities the Umbria Region has authorised the use of the timber which washes up on the banks of Lake Corbara for electricity generation purposes as an alternative to it being managed as waste.
Waste processing and waste reduction initiatives	The bulk of the waste produced in ERG Hydro derives from plant maintenance or lake and canal cleaning activities. Maintenance work generates insignificant quantities of waste except where large scale work or maintenance is concerned. The waste cleaned from lake banks and canals is mainly natural (leaves, tree trunks, algae carried by the currents) which is used for electricity generation purposes.
Environmental impact improvement targets	ERG Hydro's Environmental Statement contains a table summarising the main goals of its hydroelectric business together with a description of the activities required to achieve these.
Innovation and research	
Investment in innovation and research	ERG does not invest directly in research and technical development because its core business (hydroelectricity generation) is based on consolidated classic technologies. However, ERG has brought ERG Re-Generation Challenge to the area, a start-up competition designed to identify ready-to-market technological solutions relevant to its core business. The structures involved in managing the actions required for the achievement of its environmental goals are these same plant management areas to which legal compliance is also delegated. Specifically ERG Hydro has a HSE (Health-Safety-Environment) department whose task is to monitor and guide operations.

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	<p>In 2017 a Group HSE department designed to disseminate a risk awareness and prevention culture in the HSE sphere was also set up whose purpose is also to ensure legal compliance by means of the development of certified environmental management systems.</p>
<p>Direct atmospheric emissions reduction initiatives</p>	<p>If this is taken to mean innovation and research designed to reduce atmospheric emissions the company has no such initiatives as its production process releases no Scope One emissions, i.e. those produced by sources it owns or controls. If activities designed to reduce emissions in a generic sense are taken into account, i.e. not solely those taking place at the production plant, then ERG Hydro's hydroelectric plants play a role of primary importance from the point of view of reductions in emissions of gases harmful to the atmosphere, as hydroelectric energy sources are zero emissions.</p> <p>Considering, then, that each kWh of energy generated with water equals one less kWh of energy produced from fossil fuels the benefit in terms of pollutant gas 'avoided emissions', such as carbon dioxide (CO₂), is easy to assess. Fundamentally the energy generated from a hydroelectric plant releases no atmospheric emissions. The only emissions are those relating to potential fluorinated gas leaks, considered important in that they contribute to the greenhouse effect. Of these, the only significant gas is sulphur hexafluoride (SF₆) which is an insulating gas contained in certain types of electrical switches and panels to ensure their safe functioning.</p> <p>To date there is no reasonable substitute for these. Installed quantities are 1141 kg. Risks of such gases leaking out are monitored closely with appropriate tools.</p> <p>Scope Two emissions, i.e. those deriving from the electricity purchased by the firm, have been eliminated (market based approach) by certified green energy supply.</p>
Staff training	
<p>Staff awareness raising and training designed to reduce environmental impact</p>	<p>As plants are managed with a certified Environmental Management System all staff are aware of the approach used and what to do in the event of an emergency.</p>
Client relations	
<p>Marketing policies designed to highlight product sustainability.</p>	<p>N/A in that ERG does not work in the retail market, namely the market segment within which investors are actual individuals whose transactions are</p>

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	relatively reduced and primarily motivated by investment needs.
Relations with local government and the community	
Working together with the local council on community sustainability projects and initiatives.	ERG supports various local initiatives such as the activities of the Alviano Oasis and the Marmora Falls Nature Park as well as sponsoring various local initiatives. ERG is currently involved in various community initiatives set out in its Non-Financial Statement. These include NPC Cares in Rieti (basketball), Umbria Jazz, Umbria Jazz spring, the San Valentino marathon and Circolo Canottieri in Piediluco.
Participation in competitive tenders requiring environmental criteria	N/A
Access to public incentives for green process/product development	N/A
Membership of business associations and networks	Confindustria both nationally and locally as well as with sector operator associations.
Direct joint working with business networks and associations	ERG is a member of the following Italian associations: Confindustria, Elettricità Futura, ANEV, WEC ITALIA, IEFE, Assonime, Fondazione Sviluppo Sostenibile, Fondazione Civita. ERG also takes part in Wind Europe, SER - Syndacate des Energie Renouvelables, FEE - France Energie Eolienne, RenewableUK, SR Scottish Renewables, BWE. Bundesverband WindEnergie, PWEA - Polish Wind Energy Association, RWEA - Asociatia Romana pentru Energie Eoliana, CCE - Conseil de Economique.
Initiatives and activities in schools	ERG set up and runs an Umbrian project called A Tutta Acqua, since 2017, an upper secondary school initiative in areas with hydroelectricity plants involving visits to the Galleto plant and the Marmore falls. A further activity organised is Electricity Days for students attending the final years of local technical institutes at plant sites. It is now on its fourth year in Terni, Perugia, Rieti and Viterbo.