

# Delivering for a net zero world

Annual report and accounts 2021



### Asset strategy

Urenco's asset strategy defines the investment needed for centrifuge and associated technology refurbishment and replacement, and the future expansion and decommissioning of our plants.

It optimises the value of our assets across all sites to enhance our ability to respond flexibly to market developments and opportunities.

#### Site performance and improvements in 2021

All the enrichment plants maintained high reliability and asset integrity throughout 2021, which was demonstrated by their online performance and the achievement of business plan safety, production, delivery and sustainability goals. Alongside centrifuge refurbishment and replacements, a number of other improvements were made, including:

- Urenco Nederland installed two diesel rotating uninterrupted power supplies (DRUPS). These generators seamlessly take over the power supply in the event of the external supply being interrupted. The two systems work independently of each other, meaning continuous power is guaranteed to support essential plant equipment.
- Urenco Capenhurst (UK) refurbished the onsite sewage treatment plant, which serves the three businesses on site (Urenco UK, Urenco Nuclear Stewardship and Urenco ChemPlants) to fulfil environmental regulations and minimise environmental impacts.
- Urenco Deutschland initiated a smart metering project in their UTA-1 plant, with continuous vibration analysis. The measuring devices allow them to determine the criteria for preventive maintenance work with the aim of reducing costs by avoiding significant material damage. They also began the construction of a new office complex in support of Urenco's employees working on technology and development.

 UUSA implemented a new and innovative approach to addressing emergent work as it arises onsite through the Fix It Now (FIN) team. This specialised team resolves emerging issues quickly, which results in fewer interruptions to maintenance schedules and improved overall equipment reliability.



#### **Tails Management Facility update**

In early 2021, our Tails Management Facility (TMF) entered into operation despite some delays to the commissioning process of several months.

All utility and ancillary systems, including cylinder handling, cylinder washing and uranium oxide storage completed their commissioning stages, with decontamination, maintenance and residues recovery facilities being brought online to support the deconversion process. The deconversion process started active commissioning towards the end of 2020 and moved to first production of  $U_3O_8$  towards the end of 2021. By mid-2022, we are aiming to achieve sustainable production levels.

Several key milestones have been met, including full testing of all safety systems; the production of in-specification  $U_3O_8$ which is now stored in the Uranium Oxide Store; the production of in-specification hydrofluoric acid; and the automatic transfer of feed continuously from several cylinders. The plant has also gone through several planned outages during which no major issues were revealed.

As with the commissioning of all operational plants, there have been key learnings that the team can build on in 2022.



#### Benjamin, Work Control Coordinator, Urenco UK

At the age of 26, I have recently secured a position with the Work Control Team at Urenco UK as a Work Control Coordinator.



I started as an apprentice after leaving school, which allowed me to gain experience and learn a great deal about many aspects of engineering: mechanical; fabrication; electrical/instrumentation; and process/installation. I also discovered the various opportunities the wider nuclear industry holds and the global push for a low carbon future, which Urenco will play a key part in.

I have been lucky to win several apprenticeship awards, including UK Nuclear Apprentice of the year in 2018. It was a real privilege to be presented with such a prestigious award. Urenco then supported me to study for a degree in Mechanical Industrial Engineering, specialising in Engineering Management, which I will finish in July 2022.

I am so proud of my role at Urenco. The team around me are brilliant and all strive for excellence in the same way I do. We have a supportive manager and are empowered to promote continuous improvement to processes and procedures. It is an honour to be given that responsibility from the leaders of the company, whose level I aspire to reach one day.

#### **Ester,** Compliance Specialist, Urenco Nederland

As a Compliance Specialist at Urenco, I have many different tasks and deal with colleagues in every department. The variety and scope of the work is what attracted me to the job three years ago.

In the Compliance department, we translate legislation and regulations into practice, checking whether processes and activities are compliant. In this way, we help protect our licence to operate. Compliance looks at both management systems and operational safety.



One of my focus areas has been to develop content for our electronic learning environment to keep track of individual competencies and to show that we are fully compliant with regards to knowledge. Every employee and contractor at UNL uses the e-learning platform to complete training modules.

My manager encourages me to speak up and act accountably and responsibly, and the people around me are open to hearing new ideas. Urenco has also offered me personal and educational development opportunities.

When I joined the nuclear sector I did not have a strong opinion about it. But now, I think it is a fascinating field. When I tell people I work at Urenco, they often show an interest. I enjoy explaining to them what Urenco does in relation to uranium enrichment and the production of stable isotopes for nuclear medicine.

#### **Tim** and **Karl-Heinz,** Operations, Urenco Deutschland

Tim



In 2015, I started my apprenticeship at Urenco in Maintenance. After passing the exam at the beginning of 2019, I switched to Operations. At the same time, I started further training to become a state certified technician and passed the technical examination – Fachkundegespräch – later that year. I was tested on my knowledge in the presence of the regulatory body, the TÜV, and was proud to pass with flying colours! For me, a dream has come true. I'm happy to now be able to help this central unit at Urenco as a fully fledged member of the team and I have learned a lot from long standing colleagues, such as Karl-Heinz.

#### Karl-Heinz



I have been with the company for 28 years and I am currently working as a Deputy Shift Leader. Tim's training shows the high level of performance and knowledge within Operations. There is an incredible amount of experience available and it is important that we use it to prepare the next generation for their future tasks. Learning on the job is crucial. Knowledge is passed on internally and each operator has to prove their expertise on a continual basis. I would like to congratulate Tim on finishing his specialist knowledge examination, which completes a long term training plan. Urenco Deutschland is happy to have such a committed young colleague in its ranks.

## Julieta, Pump Rebuild & Recycling Supervisor, UUSA



I was recently appointed as the Pump Rebuild & Recycling Supervisor at UUSA. I joined UUSA in 2011 as an Operator and I progressed through the department, leading me to serve as a Senior Operator and most recently as Deputy Shift Manager. I hold a Bachelor of Applied Arts and Sciences in Technology.

My experience at UUSA has been positive. I have been able to grow and gain expertise in a structured manner, which has led to my success. My time in Operations has helped me gain knowledge in the day to day operation of the plant and how the systems work together. This will help me focus on the interdependence between the operating systems and the pump rebuild recycling department. I often get asked why I work in the nuclear industry. The reason is nuclear plays a pivotal role in our energy needs. This is especially true as the world works to reduce its carbon footprint. Urenco's experience in the industry, coupled with the innovative nature of it leaders and employees, will ensure a bright future for all of us. I am happy to be a part of that.