

Trustees' report and financial statements 2021

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# Helping the chemical science community...

I am very proud to have been appointed to the permanent role of Chief Executive of the Royal Society of Chemistry in June 2021. Having led the RSC since the start of January 2020 in an acting and then interim role, it has been a privilege to work alongside a talented leadership and staff team, and a dedicated board of trustees and membership community.

Whilst 2021 continued to be defined by our response to the pandemic, it also gave us the opportunity to adapt to the changing world of work and put in place hybrid working for all our staff, globally. This is supported by enhanced technology solutions. more effective use of our office space, a more flexible approach to meetings and better communications.



In this report we have set out the impact we have achieved during

2021 and our new strategy for the next three years, until 2025. Our strategy articulates our purpose and our vision, and how we will continue to deliver impact for the chemical sciences and in the public interest. In short, our purpose is to help the chemical science community make the world a better place.

Our strategy enables us to better support our community and bring people and organisations together, globally across academia and industry, to lead programmes of change in areas that matter, for example science culture, inclusion and diversity, sustainability and education. It also enables us to help people gain maximum value from their relationship with the RSC, through membership at any stage of their career, by publishing cutting-edge research with us or by engaging with our outstanding education resources. There are significant opportunities, post-pandemic, to inspire future generations to ensure a skilled and diverse workforce for chemical science and for chemistry.

We have already seen our work in science policy being used to inform decisions at both national and international levels, and we have provided evidence and insights through our policy reports. Providing a clear voice for chemistry, and influencing key stakeholders, to ensure investment, infrastructure and innovation is essential for enabling a strong discipline, a thriving industry and a supported community.

Whilst we remain focused on the impact we can have as an organisation, we have also ensured that our finances have remained resilient during a time of uncertainty. Revenue and expenditure were stable throughout the year and we were able to use our designated and restricted funds to provide support for the chemistry community, and investment in our future resilience. We finished the year in a financially sound position, well placed to meet future challenges and opportunities.

In 2022, we will continue to work with our community with a strong focus on our commitment to sustainability and inclusion and diversity, whilst growing our membership base and supporting those in times of need. Our members are the heart and soul of the RSC and it is with all credit to them that we are able to contribute so significantly to the global science ecosystem and to play our part in leading, partnering and supporting initiatives worldwide.

Our role is to have a positive impact on the world, through the work of our community and the significant contribution that chemistry makes to all our lives.

Dr Helen Pain CSci CChem FRSC, CEO

## ...to make the world a better place

For the biggest challenges our planet faces - whether pandemics, climate change or clean water - there is no one discipline, no one profession and no one nation that will provide the breadth of solutions needed. Our future global prosperity depends on innovation, partnerships and teamwork, between disciplines and across nations. This has never felt more important than now, as I write this in 2022, as the divisions and harm caused by geopolitical conflict reverberate around the world.

Fortunately, I know that the entire global chemical sciences community understands the essential role of collaboration, and the incredible potential they have to make the world a better place. In communications about the RSC's new strategy there is a clear focus on how the advances in science and technology will benefit people of this planet - in particular, how we will make the world more open, more sustainable, and more equal. While this doesn't cover the entire breadth of how chemistry can and does improve the world we live in, it does offer a good framework for reflecting on some of what I consider our proudest achievements from the past year.

Access to knowledge, data, insight, networks and collaboration is a vital part of how science works - and the more accessible those things are, the better the science will be. And so with more new open access journals in a range of cutting-edge fields; hundreds of hybrid events welcoming tens of thousands of delegates from all over the world; and the sixth, record-breaking edition of perhaps the world's most open scientific poster conference - #RSCPoster - our commitment to driving chemistry's transition to an open access future has never been more apparent.

2021 will be remembered as a milestone in the Royal Society of Chemistry's history: the year we embraced the challenge of sustainability in a truly organisation-changing way. A wide-ranging programme of commitments, campaigns and overhauls of business practices has put us firmly on the path of transparency and accountability, with no smaller a headline target than achieving net zero carbon emissions by 2040, with a 50% reduction by 2030, as a member of the UN Race to Zero. The full list is enormous, including taking a strong presence to the COP26 climate change conference in Glasgow, convening a taskforce of industry leaders to jointly tackle the problem of wasted polymers in liquid formulations, and setting a Guinness World Record highlighting the importance of battery chemistry. I'm personally invested in a collaborative push for global chemicals management, working with colleagues in academia, industry, regulation, policymaking and beyond, using our collective reputations and expertise to drive real long-term change, protecting our environment and saving countless lives.

Equality in the chemical sciences is a completely essential goal. More diverse teams produce better science, and it's simply the right thing to do. But with the best will in the world, if you don't feel that you can belong in a community, it will be very difficult to succeed in it. Our report, A sense of belonging in the chemical sciences, uncovered stories of "not belonging" from a huge variety of people, and added an important extra dimension to our already broad and deep portfolio of inclusion and diversity work. And through a truly industry-leading initiative - our joint commitment on I&D in publishing - we continue to make fantastic progress setting new standards for equality, working with the publishers of more than half the world's academic journals.

It's playing my part in driving real change - making our world more open, more sustainable, and more equal - that makes me proud to be part of the chemistry community, and even more so to have led the Royal Society of Chemistry as President for two years. With heartfelt thanks to our members and staff, who work and volunteer tirelessly to make it all happen, I anticipate a bright future for the RSC, for the global chemistry community, and for the world we have together helped to make a better place.

Professor Tom Welton OBE CChem FRSC, President





## **About us**

## Chemistry is at the centre of everything you can see, smell, touch and taste.

## Whether studying the chemistry of life, or developing the advanced science behind modern technology, chemical scientists use their expertise to improve our health, our environment and our daily lives.

The Royal Society of Chemistry is an international not-for-profit organisation connecting chemical scientists with each other, with other scientists, and with society as a whole. Founded in 1841 and based in London, UK, we have an international membership of over 48,000. We use the surplus from our global publishing and knowledge business to give chemical scientists the support and resources required to make vital advances in chemical science.

We develop, recognise and celebrate professional capabilities, and we bring people together to spark new ideas and new partnerships. We support teachers to inspire future generations of scientists, and we speak up to influence the people making decisions that affect us all. We are a catalyst for the chemistry that enriches our world.

## Why chemistry matters

Chemistry is the science of change. Chemical scientists investigate how and why atoms and molecules react, and use that knowledge to design and build new products useful to humankind, like medicine, fuel and advanced materials. Society uses these new products to improve our health and the way we live our lives. Modern chemistry is guided by principles of sustainability; the drugs and fuels of the future will be made with renewable starting materials and used with minimal environmental impact.

Understanding chemistry is essential in so many aspects of life. Public safety depends on evidencebased assessments of chemical risk, and science-informed policy and regulation. Eating a healthy diet means choosing the right balance of nutrients, vitamins and minerals – the chemical fuel of life. Feeling confident to participate in important societal conversations about climate change and sustainability relies on a memorable and inspiring chemistry education.

Our charitable work supports all chemical scientists – whether they're working on ensuring sustainable supplies of clean water, food and energy, advanced treatments and therapies for better health, using specialist skills to detect and remove contaminants, or answering the fundamental questions that unlock unforeseen new technologies – as they use chemistry to create a better future.



## **Our Charter**

According to our Charter, the RSC exists for "the general advancement of chemical science and its application and for that purpose:

- knowledge:

• to foster and encourage the growth and application of such science by the dissemination of chemical

• to establish, uphold and advance the standards of gualification, competence and conduct of those who practise chemistry as a profession;

 to serve the public interest by acting in an advisory, consultative or representative capacity in matters relating to the science and practice of chemistry; and

• to advance the aims and objectives of members of the Society so far as they relate to the advancement of the science or practice of chemistry."

## **OUR PURPOSE**

## To help the chemical science community make the world a better place

## Our organisational strategy for 2021-2025





The chemical science community makes an amazing collective contribution to society: developing vaccines and diagnostics when the world needs them most; keeping our food and water safe, clean and in good supply; creating technologies to generate and store clean energy; inspiring generations of young minds, helping them forge their paths to fulfilling careers and lives. This is what we have focused on when developing our next five-year strategy for the Royal Society of Chemistry: it is the people in our community who each bring their own unique contributions to the chemical science community, and it is those people who we are here to help.

Our Royal Charter, first granted in 1848, sets out our original reason for being: "to advance the chemical sciences". The Charter has four 'objects' that give more detail: that we should support the dissemination of knowledge, uphold standards of practise, serve the public interest, and advance the aims of our members as they relate to chemistry. The Charter has guided us well through our history: we're a successful organisation with a clear, timeless purpose. In our refreshed strategy for 2021, we felt we could express that purpose slightly differently, retaining its core meaning but making explicit reference to two important concepts. First: that the chemical sciences don't advance by themselves. It is the people in our community who together advance the chemical sciences. Second: that through the chemical sciences, our community strives to make real improvements to society and our planet.

# The chemical science community

When we talk about "the chemical science community", we proudly include a broad and diverse set of people who draw on chemical knowledge, skills, experience and passion to make the world a better place, including people of all ages and backgrounds, across sectors and disciplines, all around the world. The people that make up our global community have varied backgrounds, experiences and roles. Research and development scientists, entrepreneurs, innovators, manufacturers, analysts, teachers, technicians, parents, students, librarians, policy makers, funders and regulators all play their part in advancing the chemical sciences. Together they make up the chemical science community and, working with our community, we provide the infrastructure, products, services and standards that help chemical scientists to advance science.

## **Our strategy**

Our strategy will help us align around our common purpose and work towards shared goals, together with the chemical science community. It will help us be bolder, take informed risks and demonstrate our value. Derived from our charter and strengthened by many years of experience and success, we are setting out ambitious plans to develop our support for the community through publishing, membership and education. Our strength and reputation as a professional body and a global scientific publisher enables us to make an impact through our education and community activities, content and resources. It also gives us the credibility to be the voice of the chemical sciences, supporting the work we call voice and influence. The last few years have seen our voice and influence grow, in particular on sustainability and inclusion and diversity, and so our strategy makes explicit our commitments in these areas. The chemical science community will play influential and varied roles in a more sustainable and inclusive future for society – at the same time, sustainability, and inclusion and diversity, are vital for advancing the chemical sciences.

## **Our members**

Members are the core of our community, and the heart and soul of the Royal Society of Chemistry, and their contributions and feedback have been vital to building our strategy for the next five years. We rely on them to collectively use their knowledge, skills, experience and passion to lead activities aligned with our strategy – whether that's in publishing. education, professional standards, or strong public advocacy. To help them do that, we will evolve and grow our networks and communities, to welcome even more people into our diverse, global and passionate membership. We will further invest in grants, volunteering opportunities and professional development for our members, offering you the best opportunities to learn, collaborate and make an impact through chemistry. And we will continue to connect them with like-minded people to share knowledge, inspire young minds, build community spirit, influence decisionmakers, drive inclusivity in chemistry; in short, to continue to make the world a better place.





## Making knowledge more open and accessible

People around the world increasingly expect information and knowledge to be accessible in an instant, wherever they are - science is no different. As a leading publisher of chemistry research and a not-for-profit organisation working in the best interests of society, we have a responsibility to drive a sustainable transition towards open access publishing, and open science more widely.

In 2021 we published around 35,000 articles – 28% of which were published open access. We aim to be publishing 50% of our content open access by 2025. We've also seen great uptake in 'transparent peer review' on the journals we offer it for, with 35% of authors opting to have their articles' peer review comments and editorial decisions published alongside the article itself.

Through new journals, global virtual conferences and events, partnerships, technology and community passion, we have made great progress in 2021 in accelerating the chemistry community's journey towards a fully open future.

## Taking our lead from research pioneers for new journals

We work to influence the development of open access (OA) publishing using community insight and regular feedback to inform decisions that will have a genuine impact on the OA landscape. Informed by consultation with active researchers in our community, we expanded our journal collection into rapidly growing areas to offer dedicated, open access homes for high quality, interdisciplinary research in these areas.

We launched four new open access journals in 2021, bringing together the chemical sciences, physics, biology, engineering, environmental and information science to harness the incredible advances that can be made when challenges are tackled from a range of perspectives. They are all Gold open access, meaning they can be read for free by anyone, and we have waived all article processing charges (APCs) until 2024.

Digital Discovery meets the trend towards greater automation and data-driven scientific techniques head-on. It covers the application of machine learning to solve scientific problems, and is home to ground-breaking computational research from the areas of chemistry, biology, physics, and materials & biomedical sciences.

Sensors and screening is a key frontier technique identified in our 2019 report Science Horizons - over 40% of the researchers we surveyed highlighted it as important for the advancement of their own work. With a broad scope, covering physical, chemical and bio sensors as well as sensor devices and systems, Sensors & Diagnostics is our home for high impact sensors research.

Our existing environmental science journals all have chemistry at their core. Environmental Science: Advances spans not only chemistry, but also research from any discipline related to the environmental sciences. It welcomes research from any discipline that will contribute to the understanding of the environment, and to the advancement of several UN Sustainable Development Goals - original thinking to take on the world's biggest challenges.

And *Energy Advances* focuses on energy science, and in particular the interdisciplinarity required for exciting breakthroughs in the field. The journal welcomes research from any related discipline including materials science, engineering, technology, biosciences and chemistry. Our aim is for it to embrace exciting energy science research particularly at the boundaries where disciplines cross, and where communities collaborate to inspire new thinking.

> It is so important to support the energy research community 66 with inclusivity and robust scholarly science – and the RSC has earned the reputation of being a champion of publishing quality, so I am excited to contribute towards the open access transformation. Professor Volker Presser, Energy Advances Editor in Chief; Chair for Energy Materials at Saarland University in Germany

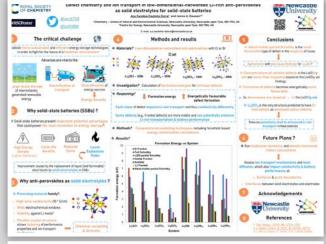




If you have a paper that, as my friend and collaborator Marty Burke says, "lives at the edge of your imagination" in chemical sciences, consider Digital Discovery as a friendly home.

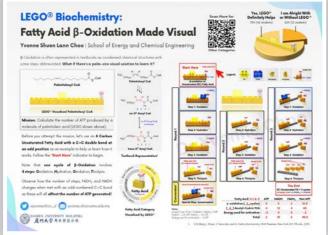
Alán Aspuru-Guzik, Editor-in-chief, Digital Discovery; Professor of Chemistry and Computer Science, University of Toronto





The Schlenk Line Survival Guide









**#RSCPoster** 

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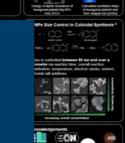
## **Digital engagement** with open science

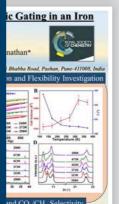
We announced our support for the OA Switchboard initiative, a notfor-profit, industry-wide collaboration among publishers, academic institutions and research funding organisations. As an independent intermediary, OA Switchboard aims to connect parties and systems, streamlining and simplifying the exchange of OA related publicationlevel information.

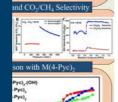
Our seventh annual RSC Twitter Poster Conference – **#RSCPoster** - engaged more people in more countries than ever before, featuring almost 900 posters from 62 countries, and reaching a potential audience of nearly eight million people around the world. The poster conference takes place entirely online and is open to researchers anywhere. This year, more than 5,500 people actively participated through more than 10,000 tweets - nearly double the number of people who participated last year. This year's conference introduced several new features, including, where poster presenters

> recorded short videos to briefly communicate their science, and #RSCPosterLive, a series of webinars covering mental health and career development for early-

> > career researchers.









were fully online. While this change brings its own challenges, our events programme in 2021 reached more people than ever before, with delegates from all around the world able to join high quality scientific events from the comfort of their homes and offices.

We ran nearly 250 scientific conferences and events in 2021 – a huge increase from a disrupted 2020, and close to our pre-pandemic 2019 total - and for those events we welcomed nearly 30,000 delegates. Because the events were online, the increase in delegate numbers did not increase our carbon emissions - quite the opposite compared with previous years, as far fewer scientists needed to fly to attend.

These include a series of "desktop webinars" and events run in partnership with leading Indian institutions like the Indian Institutes of Science Education and Research (IISER) and the Indian Institutes of Technology (IIT) that attracted 4,000 delegates, a series of webinars on open access publishing for Chinese researchers attended by 2,000 delegates, and a joint symposium with our flagship journal Chemical Science and the Nankai University in China that attracted 5,000 delegates.





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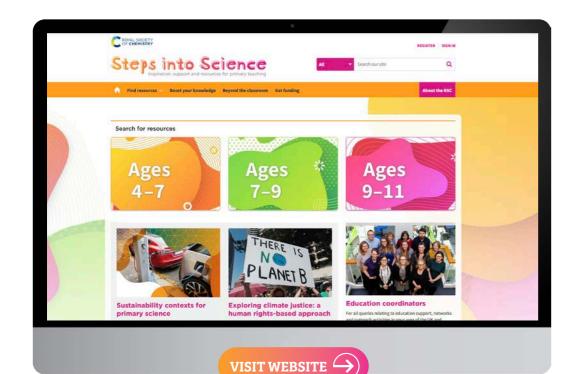


## Making research more discoverable and accessible

We are constantly working on ways to make research that scientists publish with us easier to find, access and share online, as well as making the process of submitting research as simple and quick as possible.

Working on the user experience and technology behind our flagship, gold open access journal Chemical Science, we reduced the time it takes a researcher to submit their work by 41%. Our wellliked article tracker, that allows researchers to track where their work is in the publication process, saw a 40% increase in usage.

We reduced by 95% - from 10 weeks to 3 days - the time for our research to be indexed with Web of Science, ensuring that researchers' work can be read and cited sooner. We also improved how we deliver data to CAS, Crossref and Pubmed, using the industry standard JATS format. And we automated our deposition to PubMed Central (PMC) - as a result of this work alone, Chemical Science downloads from PMC increased by 50,000 per month (+15%).



## **Supporting skills** and professionalism at every step

From the earliest experiences of learning about science to the culmination of a rewarding career, we help people develop and grow at every stage of their chemistry journey. Our continued support throughout school, work and retirement is the reason we have close and valued relationships, built over decades, with so many of our members.

## Helping the youngest learners take their first steps into science

We launched our new website for primary teachers, Steps into Science. With curated resources organised by age group and topic, the site is designed to help primary teachers find all the support and resources they need for making primary science lessons accessible, inclusive and engaging, whether in the classroom or online. Beyond engaging young learners, Steps into Science is also designed to boost teachers' confidence and help them feel comfortable and enthusiastic about their science lessons. We also supported this goal with more than a hundred online sessions reaching 1,638 primary teachers.

## **Practical science**

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Our collection of video teaching resources has been popular for many years, but in the last couple of years they've been more important to teachers than ever before.

We collated the best video support for 24 core practical experiments, including publishing 10 new videos to support some of these practicals, along with extensive additional resources. The new videos were viewed nearly 100,000 times on YouTube, along with great engagement and feedback from teachers.

## Supporting early career teachers

We gave extensive support to early career teachers across the five nations of the UK and Ireland, including 60 online sessions for more than 2,500 trainee and student science teachers, and a dedicated trainee teacher conference in partnership with the Institute of Physics and CLEAPPS.

We once again administered the Teacher Training Scholarship scheme for chemistry in England, and provided an ongoing programme of support for student teachers in Scotland, culminating in an online conference for all student teachers of science in Scotland.

## I have really enjoyed teaching these lessons because they created an atmosphere of awe and wonder in my classroom and encouraged the children - and me - to have a go. Primary school teacher and user of Steps into Science



## Recognising professional dedication and achievement

As a professional body one of our most important roles is setting, upholding and maintaining high professional standards, and celebrating our community when they meet or exceed those expectations.

In 2021 we continued to broaden the kinds of excellence that we recognise, driving towards a more inclusive system of recognition for everyone in science, no matter their sector, job, career stage or area of expertise within chemistry.

Our professional chartership and registers – awards that demonstrate dedication and skill – saw greater numbers of awardees than ever before across the board, with an overall 40% increase in Charter awardees, encapsulating a 40% increase in those awarded Chartered Chemist (CChem), the pinnacle of professional recognition from the Royal Society of Chemistry.

Our professional scientist registers saw a 16% increase in awards for Registered Scientist and Registered Science Technician. We are continually expanding our recognition and support for technical staff, and in 2021 our first-ever joint Royal Society of Chemistry / Institute of Physics / Royal Society of Biology conference for technicians was hugely popular, becoming over-subscribed in a matter of hours after registration opened.

Company accreditation gives employers and staff the confidence that their company training is of the highest standard, and we reaccredited training schemes at National Nuclear Labs, Magnox, Qinetiq, and ThamesWater. We also awarded our first-ever company accreditation outside of the UK and Ireland: Petronas in Malaysia.

To help people more easily display their professional accomplishments and status, we launched our RSC digital credential platform, issuing 67,000 digital membership badges and cards. These digital credentials are trustworthy and easy to use, and many hundreds of members proudly shared their new credentials on social media after launch.

## science, the prizes are awarded to teams or collaborations that are opening up new directions and possibilities in their field. We also announced our *Research & Innovation Prize* winners, our Volunteer Recognition Prize winners, and the winners of our Inclusion & Diversity Prize, which we now award annually. We expanded our Education Prizes to give wider recognition to the people who nurture and inspire the next generation of talent. Having consulted with our teaching community, we broadened the portfolio to include a wider range of teaching excellence – with more than double the number of prizes offered previously – and also changed the nomination and application timings to better suit educators' needs. Our Excellence in Education Prizes celebrate inspirational, innovative, and dedicated people working in primary, secondary, further education and higher education including teachers, teacher trainers, student mentors and more. Meanwhile our Horizon Prizes for Education - which we

of education.

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portfolio in 2021.

**Celebrating excellence through** 

structures, we launched or enhanced almost all of our prize

our revamped prize portfolio As part of our continued overhaul of our recognition

We introduced our first winners of *Horizon Prizes*, which are designed to recognise the most exciting contemporary

are celebrating for the first time this year - highlight recent

initiatives that are set to make a real impact within the field

We should look with pride on scientists and what they have done over the last 18 months. If anyone had said before COVID that we would have invented a vaccine and deployed it so quickly, we wouldn't have believed it. It was British science at its best. I would like to thank the Royal Society of Chemistry for recognising all that British scientists and clinical researchers have done. sir Patrick Vallance, UK Government Chief Scientific Adviser





Over the past two years, educators have had to deal with circumstances unlike anything we have seen in living memory; with remote teaching and lack of access to equipment due to COVID restrictions making the sciences a particularly tricky subject to teach. What we have seen is resilience and brilliance – and our winning individuals, teams and schools stand high in a particularly inspiring field of nominees.

Professor Tom Welton, President, RSC

Our Biological and Medicinal Chemistry Sector (BMCS) group awarded its Malcolm Campbell Memorial Prize for 2021 to Sir Patrick Vallance, UK Government Chief Scientific Adviser, on behalf of all British scientists and clinical researchers involved in the fight against COVID-19.

# **Growing and** empowering our membership community

## Welcoming more members

In 2021 we admitted more than 10,000 new members, taking our end-of-year total to over 48,000, with a higher-than-usual retention rate of 93%. Those members are taking advantage of our new online *members area*, with over 1.8 million pageviews last year. Through 12 Instagram live sessions we answered questions from prospective and existing members. And our *new member case studies*, celebrating the diversity of our membership, received over 72,000 pageviews.

One proud achievement is the huge increase in student members, with over 5,500 joining in 2021, more than twice as many as a typical year. Having strengthened our support for students to include special offers to those at accredited universities, access to the Abintegro digital learning platform, and eligibility for funding to gain practical chemistry experience lost during lockdowns, our total student membership is now over 9,000.



STUDENT MEMBER

I think one of the greatest things about the society is that anyone can meet anyone – as an undergrad I've been able to meet and have a conversation with the current president, which I think is fantastic.



## New subject communities for greater impact and collaboration

Following a review initiated by our Member Communities Board (MCB), we announced that RSC Science and Education Divisions would over the following twelve months transition to a new group of Subject Communities, with a focus on helping members to further collaborate, influence and make an impact with their science. Changes include the names, scopes and compositions of existing Divisions and their Councils, all intended to evolve our Divisions to better reflect the breadth of the chemical sciences and the important role our members play in making the world a better place.

Each Community will bring together members with similar scientific and professional interests, from across academia, education and industry, and engage closely with our Interest groups. A survey of members of our Industry and Technology Division (ITD) led to a renewed focus on their participation in the Subject Communities, rather than in a separate group. ITD will be disbanded in favour of closer collaboration with the other communities; members will also be able to access an industry information hub, and we are continuing to develop our offer to better suit the needs of members working in industry. A new Science and Innovation Leadership Forum (SILF) will bring together Community Council Presidents to share best practice and identify opportunities for collaboration. The SILF will provide insights to inform strategy and thought leadership, drawing on the expertise of more specialised advisory groups as required.

## **Recovering from the side-effects of COVID-19**

The chemical science community has played an enormous role in the world's battle against COVID-19, from revolutionary vaccines and lifesaving treatments to maintaining our energy and water supplies through the most difficult periods. But many in the community have also suffered: not only from illness and grief, but from the secondary effects of mitigating policies like lockdowns.

Chemistry undergraduate students had a particularly challenging time through the lockdowns of 2021: studying a highly practical, hands-on subject but with limited or no access to teaching laboratories. Supported through the secondary purpose of our Chemists' Community Fund, we committed more than £1.6 million in grants for undergraduates to gain practical laboratory experience that they missed out on through lockdowns.

Teachers of chemistry and their students also suffered through lockdowns, as almost all were required to teach and learn remotely, again missing out on practical experiences. When we surveyed trainee and first year teachers, more than three quarters said that they needed extra training in science practicals, having not had the classroom time to develop those skills. We raised the issue in public and with UK parliamentarians, several of whom raised the issue in parliament.



I felt like I had some backup. What I couldn't do very much was to consolidate... having the feeling that I had someone there backing me up and doing that consolidation really took the weight off my shoulders.

[The students] definitely appreciated it. They were really happy that they had this opportunity, and they said it helped them with their confidence.

**Comments on Elevating Chemistry from participating teachers** 

RICHARD BROWN FRSC CChem CSci CEnv



that is useful.

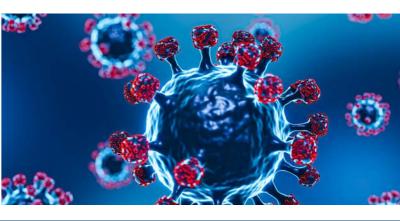
RSC has provided me with

opportunities. Initially it was the

early career awards which were really valuable. Then the subject

awards and moving on to the more senior awards. I think it is that spectrum of opportunities

To help with some of this lost learning, particularly for schools where a high proportion of pupils have limited access to technology, we developed our Elevating Chemistry programme. It provided funding, through the Chemists' Community Fund's secondary purpose, for 10 schools to run projects that counteracted the effects of school closures and other COVID-19 measures on their students' learning. Projects included providing tutors, supporting the development of practical skills, and consolidating knowledge through the use of revision guides and revision sessions. Six of these schools extended their projects to 2021/22, and we are identifying a new cohort of schools to start projects in 2022.



## A strategic approach to sustainability

As the UK prepared for hosting the 2021 UN Climate Change Conference of the Parties, also known as COP26, we took our sustainability commitments to the next level. For the first time, we have an RSC-wide strategic approach to sustainability, which is a long-term organisational commitment, and includes our own operational activity. We also initiated a two year programme focused on accelerating our commitment to sustainability, using COP26 as a springboard, and drawing on all of our organisational strengths and resources.

## Committing to change and forging partnerships

While it's important that everyone plays their own part, collective action – by governments, companies, communities and organisations like ours – is crucial to making progress on the biggest sustainability challenges.

We proactively signed up for collective action to demonstrate our commitment and to help bring the power and passion of our community to a wider stage: most notably our commitment to reducing our carbon emissions to net zero by 2040, joining the *UN Race to Zero*. RSC president Professor Tom Welton said at the time: "It is essential that the RSC takes a leadership role on behalf of chemistry and chemical scientists everywhere." We are one of the original supporters of **Professional Bodies Climate Action Charter**, alongside eleven other professional bodies – in total representing more than 400,000 professionals – and a further 300 member organisations. It commits us to support members to prioritise both the UN Sustainable Development Goals and the Paris Agreement in their work.

We were the first major learned society to sign the *SDG Publishers Compact*, a UN-led initiative designed to inspire action among publishers and accelerate progress to achieve the Sustainable Development Goals (SDGs) by 2030. We also signed *Publishing Declares*, a pledge on climate action from 82 major global organisations related to the publishing industry.

And in May we convened a task force, supported by industry partners including BASF and Unilever, to address the hidden challenges of polymers in liquid formulation (PLFs). Found in millions of consumer and industrial products, they are an intrinsic part of our lives – from ingredients in the paints on our walls to the shampoos and detergents in our cupboards. Despite their importance, the way that PLFs are made, used and disposed of is putting unnecessary strain on our environment by releasing carbon dioxide, using up finite resources and generating physical waste. The task force aims to create a true cross-sector circular economy for PLFs, collaboratively solving issues and sharing the latest science and technology opportunities.

## Polymers in Liquid Formulations

**PLAY VIDEO** 



How can we improve the ustainability of a sector worth \$125bn each year?

SUSTAINABILITY -

20





Making a sustainable shift towards the circular economy requires close collaboration across the chemistry ecosphere, so we are delighted to join the task force and be part of the solution. By bringing together the latest material science and technology, we can create new innovations that further improve ingredients and formulations used in everyday products for the benefit of people and the planet.

Jason Harcup, Global Vice President for Research and Development Skin Care at UnileverChief; Chair for Energy Materials at Saarland University in Germany



## sustainable chemistry

For many years we've published a range of high quality journals, books and other scientific information related to sustainability and the environment – with an increasing number being launched as or converted to gold open access.

In September we started accepting submissions to *Energy Advances*, our newest gold ope access journal, which joined our line-up of dedicated energy journals including *Energy & Environmental Science, Sustainable Energy and Fuels and Journal of Materials Chemistry A.* It is designed to complement these by broadening the subject coverage while increasing author choice and improving accessibility to our journals. We also published special collections of articles in our journals relating to emerging areas of sustainability and showcasing our relevant book titles, including on sustainable polymers and polymers in liquid formulation (PLFs).

In December we held **#RSCBatteriesPoster**, a spin-off event from the hugely popular #RSCPoster competition that runs in March each year. This spin-off was aimed at driving the discussion on batteries research and innovation – a key theme for us throughout COP26. Like our main **#RSCPoster** event, **#RSCBatteriesPoster** enabled scientists at every career stage to share their research, network with colleagues and engage in debate. One participant said the event was "a great way to get to know energy storage researchers from around the world without having to leave my living room".

Research and our own experiences show that younger people are inspired by areas of study and work that help to make the world a better place. On our education website we collected our sustainability-related resources – including lesson plans, experiments and activities – to help teachers and their students explore chemistry's role in sustainability.

Being a part of the solution to climate change and other sustainability-related challenges is a huge draw for Generation Z, so we've updated our Future in Chemistry careers guidance website, including a wide range of inspiring resources on study options, job profiles and different routes to a fulfilling and socially-aware career.

We surveyed teachers, young people, employers and other people working in the chemical sciences about how sustainability should be incorporated into school curricula. That insight informed our report, *Green shoots: A sustainable chemistry curriculum for a sustainable planet*, as well as a series of commitments for ourselves and a call to the UK government to urgently prioritise updating the school chemistry curriculum so it prepares all young people to fully participate in efforts to tackle climate change and sustainability challenges.

## Capturing the imagination of policymakers and the public

Sustainability challenges go way beyond the science: public acceptance and demand for more sustainable living drives policy and societal change. Throughout the year we told powerful stories about chemistry's role in sustainability, gaining significant attention on the issues in the media and at COP26.

At the start of the year, we published *a story based on new research into people's technology buying and recycling habits*. BBC World News, Yahoo and others covered our findings that a worrying proportion of people who acquired new technology to support working from home during lockdowns were either hoarding or binning any redundant technology.

We surveyed people worldwide to find out *how attuned they were to issues of sustainability around plastics* – how much they cared and what their level of knowledge was. We found that while people were generally enthusiastic about protecting the environment, many were frustrated by confusing labels and recycling bins, or simply found it too difficult to avoid consuming plastics in their day to day life.

*Our new podcast series, Brought to you by chemistry,* launched with a seven-episode season focused on plastics. Hosted by Dr Alex Lathbridge and featuring guests including BAFTA-winning broadcaster Liz Bonnin, the series various covered the various complexities of our planet's plastic problem – from life-cycle assessment to waste management and innovation. The podcasts were downloaded, watched and listened to thousands of times across a range of platforms.

At the COP26 conference in Glasgow, we were able to network with a global, influential group of policymakers, politicians, scientists and more. At events and meetings we were able to share our *climate change position policy asks* and *manifesto of actions*, highlighting the changes in approach needed to ensure chemistry makes its maximal contribution to mitigating climate change.

Our twenty virtual events at COP26 highlighted the huge range of areas where chemists have a role to play – from developing protective paints for wind turbines, to improving air quality in the Global South, and researching sustainable ways of making to plastics and cement. We also showcased innovative SMEs that are developing essential technologies for the future, including better carbon capture solutions, faster charging batteries, more efficient solar power and higher efficiency green hydrogen production. We made the *events available for anyone to view online*.

Working with RSC Trustee and battery expert Professor





Saiful Islam, in November *we set a new Guinness World Records title for the highest voltage from a fruit battery*. 2,923 lemons generated an astonishing 2,307.8 volts, smashing the previous record of 1,521 volts, and launched a battery-powered go-kart race run by the Blair Project in Manchester. The record attempt was designed to highlight in the context of COP26 the importance of energy storage and the need for new innovations for a zero-carbon world, and gained television media coverage on BBC and ITV as well as extensive online coverage.





IN PARTNERSHIP WITH ITALY

## Pakr bekr in W 19 th sp sc

# Belonging in the chemical sciences

We are committed to making the chemical sciences more inclusive and diverse. But research shows that including people isn't enough. Unless people feel they belong, they are unlikely to thrive in our profession. That's why we commissioned the first ever study of chemical scientists' lived experiences of belonging in the chemical sciences.



When people feel they belong, they are more able to share their ideas, be creative and collaborate. Not only do they enjoy their work more, but they perform better. The result is that they are more likely to stay in our profession and contribute to the success of the chemical sciences.

Helen Pain, Chief Executive, Royal Society of Chemistry

A sense of belonging is subjective and arises from our dayto-day experiences. We held a series of online interviews and focus groups with chemists based in the UK and internationally in spring 2021, asking them about their lived experiences of belonging and not-belonging in the chemical sciences. Through our research we identified five enablers of belonging:



**CONNECTION:** experiencing positive, professional relationships that are supportive, kind and encouraging



**RESPECT:** feeling accepted and respected for whoever you are, whatever your professional background, gender, race and ethnicity, sexual orientation, age, socio-economic background, or disability



**DIVERSITY:** not having assumptions made about you, or having other people reduce your uniqueness to a stereotype



**INCLUSION:** seeing evidence of organisations taking action to create an inclusive culture



**INTENTION TO BELONG:** developing and displaying self-confidence, and sometimes having to adapt or hide aspects of yourself to fit in



Based on the findings of our research we made three commitments: to host further conversations about belonging with our governance and committees, networks and communities; to further develop our existing networks for members and non-members to foster an improved sense of belonging in the chemical sciences; and to develop a toolkit to help organisations and individuals foster belonging in the chemical sciences.

## Inclusion and diversity in science publishing

Data, insight and lived experience show us that there are several barriers to research publishing across genders and race. In 2020 we launched our *Joint Commitment for Action on Inclusion and Diversity in Publishing*, a collaborative initiative to eliminate bias and discrimination in publishing, and in 2021 that initiative took several major steps forward.

We welcomed new signatories to the group, including Springer Nature, De Gruyter and Taylor & Francis Group, bringing the total number of organisations to 47, with a combined portfolio of 15,000 peer-reviewed journals – half of the world's academic journals.

We released the first widely-agreed *minimum standards for inclusivity in scholarly publishing*, upon which the industry can build a more inclusive future. This was one of the original aims that the group agreed as a priority to proactively eliminate bias. Delivering the minimum standards fulfils one of the *four objectives of the group*.

Other progress from the collective over the past year has included facilitating requests from hundreds of researchers to change their names on papers they are authors on, to support women and transgender scientists in particular by respecting the author's right to their own identity while ensuring they are credited for all their work. Details of the practice have been shared with the Committee on Publication Ethics (COPE) and the National Information Standards Organization (NISO) with the hope of achieving widespread adoption around the world.

## Funding for better inclusion projects

Partners and community members often have incredible knowledge, skill, insight and connections, and we all benefit from working collaboratively. By sharing our own knowledge and resources, we achieve greater reach and impact, influencing people we couldn't reach on our own.

We funded 69 projects from our Outreach Fund, including 19 supported directly by the Chemists' Community Fund through its secondary purpose. These projects included hands-on chemistry experiences for children with special educational needs, young people experiencing socioeconomic deprivation, and for disabled adults.



Thank you (and your panel) so much for supporting our project and, ultimately, our vulnerable pupils. We really could not have initiated chemistry within our curriculum otherwise. I cannot wait to show you the impact of your support at the end of this academic year!

Jon Seymour, Pupil Referral Unit

We also awarded eight *Chemistry for All* outreach grants totalling £191,714 which aim to help people to change their outreach delivery approaches by implementing the findings from our *Chemistry for All* research published last year.

Our special funding call for community-driven projects that support the inclusion of Black people in the chemical sciences attracted a number of great projects that delivered thought-provoking results throughout the year, including workshops, teaching resources and engagement events. The standout #BlackInChem project won our Inclusion & Diversity Prize for 2021.

At our Inclusion and Diversity Forum we announced that we are partnering with the Windsor Fellowship to launch, also supported by the Chemists' Community Fund, to support aspiring chemistry students and achieve greater retention of younger people from Black and minority ethnic backgrounds.

## Chemists' Community Fund

The Chemists' Community Fund, the working name of the Royal Society of Chemistry's Benevolent Fund, is a linked charity to the RSC. Its primary purpose is the relief and prevention of poverty for members or past members of the RSC, as well as support for their partners, children and other dependents.



If the funds are not all needed for this primary purpose, then support can be directed to meet the needs of a wider community, to support those in hardship and for other charitable purposes, under its secondary object.

## Supporting chemists during 2021

It is a strategic priority for the Chemists' Community Fund's to respond with agility and flexibility to changing community needs. We continued to prioritise support of chemists and chemistry students affected by the COVID-19 pandemic, developing our services in response to the longer-term impacts around the world. The positive feedback on our approach continues to shape the direction of our future support.

In 2020 we necessarily focused on relief from the immediate impacts of COVID-19. In 2021 we evolved our assistance to meet longer-term concerns, both of individual beneficiaries and our community as a whole.

In April we launched our Wellbeing and Listening Service for those dealing with isolation or with concerns about their mental health. The line extends our hours of availability and provides more timely onward counselling referrals for members and their partners.

The CCF funded the RSC's new online career tools, following increased enquiries to the CCF and careers teams including advice on career development and job searching. We also expanded and extended to the end of 2021 our COVID-19 hardship support to non-member chemists and chemistry students in the UK and ROI.

All this taken together resulted in a 14-fold increase on 2017 for the number of people financially supported by the CCF.

Year	Number of new enquiries	Total number of people supported across all CCF services	Number of people supported financially	Grants awarded
2015	110	Not recorded	16	£19,854
2016	110	Not recorded	20	£32,078
2017	174	Not recorded	23	£40,512
2018	183	193	25	£46,514
2019	351	553	34	£99,788
2020	842	931	439	£323,655
2021	549*	798**	235	£443,349

Many new and existing beneficiaries saw a change or deterioration in their circumstances due to the impact of COVID-19. For each new enquiry our caseworkers seek to help beneficiaries access both the financial and non-financial support and expertise they need. The value of this ongoing holistic casework support cannot be measured solely in financial terms and beneficiary numbers; and the impact is often not solely based on the value of an award, but the context of how the support is provided to help beneficiaries' needs in that moment.

"

I must thank you for your help in following through the application process with me...and it happened super quick. I'm eternally grateful to you and the Royal Society of Chemistry. Gr
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CCF has helped me in my toughest times... not only with financial issues but with personal issues as well.

## Examples include:

- Support towards a home adaptation to enable a member to maintain their independence
- Grant towards a new laptop and software support for a disabled member's continued study
- Help for members and their families to explore and access support following a dementia diagnosis
- Support with living costs for PhD student members
- adversely affected by COVID-19 restrictions, eg stipends not extended to meet delays
- Help with relocation costs for members starting a new job
- Support for members who have lost income or regular salary payments have been suspended, in countries where no state support has been available
- Regular befriending calls from our dedicated volunteers to other members
- Continued to provide 15 members 'Talking Chemistry World' to supplement the print edition
- Gains of £8,572 of benefits through our partnership with Citizens Advice Manchester (CAM)
- Debt advice via our partner CAM led to a positive outcome of circa £15,000 for a member
- We supported a total of 798 people in 2021 including through financial grants, funded service referral for legal advice, counselling or benefits, visits or calls from a volunteer,
- bespoke CCF workshops, and Talking Chemistry World.

## Workshops

We hosted eight online workshops in 2021, with 538 people attending – a five-fold increase on numbers before the COVID-19 pandemic. Topics included helping with debt, resilience and adaptability, redundancy support, student finances, and retirement planning. These sessions had a further 510 views following the workshops. The most popular workshop was Resilience and Adaptability, with 184 attendees.



## Secondary purpose

In addition to the support above, we extended our support of our wider community under secondary purpose with the following in 2021.

- Grants for Carers and Assistance Grants continue to enable those with caring responsibilities and for those with illness or disability to attend professional events and meetings
- Bullying and Harassment listening and signposting service.
- Support of the Daphne Jackson Trust to support returners to work
- Outreach Grants 2021 to supplement RSC support for outreach programmes that directly reach underserved groups.



- Undergraduate practical skills support to enable students that would lose income to attend practical catch up sessions outside normal time-tabling, due to impact of COVID-19.
- Lost learning scheme supporting and understanding catch up needs, due to COVID-19, in disadvantaged secondary schools
- Windsor Fellowship Black and Minority Ethnic (BAME) Student Mentoring Project, partnership of student mentoring for underrepresented BAME students from 2021 – 2026
- Disability Officer Role a fixed-term role to better understand the current needs and barriers faced by disabled chemists and inform our going support.





#### Enriching education, employment and citizenship

## **CCF IN NUMBERS**

# 798

people received support from the Fund in 2021

**549** people received support new enquiries for help and support

110

calls to our new Wellbeing and Listening Service

**43** volunteer calls took place to support members

**15** members regularly receive an accessible Talking Chemistry World





140

members regularly receive Talking Chemistry World





**10,715** letters sent to retired members

across the UK & Ireland within their local section Christmas card



## FINANCIAL REVIEW



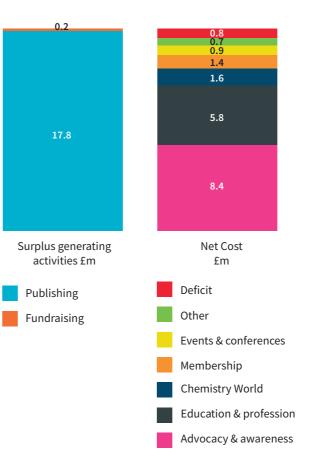
Our finances have remained resilient during the pandemic period. Income and expenditure were stable, with no material year on year movements and an operating surplus achieved in our unrestricted funds. We used our designated and restricted funds to provide support for the chemistry community, and investment in our future resilience. Our balance sheet strengthened in 2021, with investment portfolio gains and a reduced pension deficit contributing to year on year increase in the net assets position. Cash flow was healthy throughout the year.

Overall, 2021 is a year in which our finances contributed to our organisational stability during a continued time of uncertainty, and we finished the year in a financially sound position, well placed to meet future challenges and opportunities.

### Key activities in 2021

Our publishing operations are central to achieving our charitable objectives in support of the chemical science community and advancing excellence in the chemical sciences. Our publishing income of £56.3m, whilst slightly lower than what was recognised in the prior year (2020: £57.9m), continued to generate a significant proportion of our income, constituting 88.4% (2020: 89.3%) of the total income for the year.

> Surplus generating activities and application of surplus



#### Definitions

These are funds which are not held for any particular charitable purpose. They are split between usable and unusable funds.			
These are unrestricted funds made up of our general funds, funds retained within non-charitable subsidiaries and designated funds.			
These funds are made up of the pension reserve, which represents the RSC's defined benefit pension liabilities as at year end. The pensions reserve is reduced by payments made against the agreed recovery plans in the year.			
These are unrestricted funds representing monies earned primarily from publishing activities, membership subscriptions and investment activity.			
These are unrestricted funds that have been internally 'ring fenced' for a specific purpose and consist of earmarked funds, member network funds and various trust and lecture funds.			
Represent grants, financial or other gifts bequeathed in a will or trust deed to the RSC with a specific direction as to use. These are not available for the general purposes of the charity and consist of the Chemists' Community Fund, various trust and lecture funds, restricted grants, Royal Chemistry India Foundation and Friends of the RSC, Inc.			
The amount of general funds after deducting the balances held within our fixed assets. The portion of 'available reserves' freely available to spend and use on any of our charitable activities.			
Assets purchased for long-term use, and not likely to be quickly converted into cash. This includes buildings, equipment, software and intellectual property.			
Funds held by investment managers on our behalf for the purpose of generating income and capital gains over the long-term.			
Amounts owed from third parties – mostly our customers.			
Amounts owed to third parties – mostly our suppliers.			
Income received / invoiced in advance for journal and membership subscriptions relating to future years. This is held on the balance sheet and only recognised as income in the year in which the services are provided.			
Includes cash held at the bank and short- term highly liquid investments.			
The capital, which is used in our day-to-day operations, calculated as current assets (ie cash and debtors) less current liabilities (ie creditors and deferred income).			
The net deficit on our pension scheme, representing the difference between valuations of the pension scheme assets and liabilities.			

Investing in the continued strength of the publishing business is a key priority for the organisation, as is investing in growing other commercial income streams to achieve greater income diversification.

Overall, our publishing operations generated a net surplus of £17.8m (2020: £18.6m). A portion of this surplus has been invested in the continued development of our publishing products and services, while the majority has been used to fund our other charitable activities and our running costs. Refer to page 10 for more information on how we are making knowledge more open and accessible.

We have continued to review and prioritise our activities according to strategic impact as well as accommodating the activities brought about from the COVID-19 pandemic. We generated £63.7m of income across the group in 2021, representing a decrease of £1.1m on income recognised in 2020 (2020: £64.8m). Total group expenditure in 2021 was £64.5m, representing a small increase of £0.2m on 2020 expenditure (2020: £64.3m).

In 2021 we continued to support the exchange of knowledge through our events programme and similar to 2020, almost all of our events were fully online.

We spent £1.3m (2020: £1.2m) on organising and sponsoring conferences and symposia, including those events which

moved online. Refer to page 13 for more detail on the events that took place in 2021.

We continued to invest in education and professional practice programmes to help secure a strong, diverse and sustainable pipeline of chemists at all levels. We spent £6.2m (2020: £6.4m) on our education and professional practice programmes in 2021. Refer to page 14 for more information on how we have helped people develop and grow at every stage of their chemistry journey.

In addition, we continued to support chemical science professionals and students through our member services, with total spend on membership of £5.5m (2020: £5.6m). Refer to page 18 for more information on how we have grown and supported our membership community.

We also supported a range of activities to engage the policymakers and the public with the chemical science community. Refer to page 23 for more information. Overall, we spent £8.4m (2020: £7.8m) on advocacy and awareness programmes in 2021.

The breakdown of our sources of income and areas of expenditure are shown in the charts below.



The activities undertaken in the year were carried out within the budget approved by our Trustees, and all the income of the charity has been spent on our charitable and fundraising activities or retained in our charitable reserves (see notes 25 and 26).

Overall, we saw a net operating deficit of £0.8m (2020: net operating surplus of £0.5m), and a net surplus of £5.8m after investment movements (2020: net surplus of £9.0m) was achieved. The table below reconciles this to the operating surplus of £1.4m reported in our internal management accounts.

<b>'Real' operating surplus</b> As reported in internal management accounts	£1.4m
Add: Investment Income Not included in the management accounts as the income was reinvested in the portfolio rather than used to fund operating expenditure. The income is shown in the Consolidated Statement of Financial Activities (SOFA) as required by accounting rules.	£0.8m
<b>Less: Defined benefit pension fund interest</b> Not included in the management accounts because this is a notional cost that accounting rules require to be shown in the SOFA.	(£0.5m)
<b>Less: Foreign Exchange</b> Not included in the Management accounts as notional revaluations do not form part of operational budgeting.	(£1.0m)
<b>Less: Investment Management Costs</b> Not included in the management accounts because investment portfolio costs do not form part of operational budgeting.	(£1.5m)
<b>Net operating deficit</b> Per the SoFA.	(£0.8m)
<b>Add: Investment movements</b> Not included in the management accounts because investment portfolio movements do not form part of operational budgeting.	£6.6m
<b>Net income</b> Per the statement of financial activities.	£5.8m

Our usable reserves, consisting of general funds, funds retained in non-charitable subsidiaries and designated funds, remain healthy with a balance of £108.4m (2020: £105.0m).

Our overall working capital position remains strong, with a net current asset position of £7.3m (2020: £7.7m) owing to the large cash and debtors balances offsetting the creditor balances and advance payments received for journal and member subscriptions.

Overall, our financial position remains healthy, with substantial usable reserves readily available to fund future activities and ensure operational stability. We will continue to focus on allocating our resources to deliver our strategy in a sustainable and effective way.

## Investments

We hold financial investments to maximise the security of our reserves and generate returns. Our investment portfolio is designed to ensure long-term growth and to provide additional funding to support our charitable objectives.

The long-term investment objectives for general funds and restricted funds are to achieve an annual rate of return of 2.0% (2020: 2.0%) in excess of the rate of UK inflation, as measured by the Retail Price Index (RPI), after fees and costs at an acceptable level of risk for the investment portfolio.

Trustees adopt an investment time horizon of at least 10 years, over which they aim to achieve their objectives and expect the portfolio to remain substantially invested. The Trustees accept that investment performance objectives may not be achievable every year and that there will be occasional temporary adverse movements. As a result, we will review investment performance over relevant time frames.

Responsibility for investment strategy resides with the Board of Trustees, acting under advice from the Finance and Resources Board. Investment parameters are agreed with our investment managers, whilst monitoring performance in the context of long-term objectives and external benchmarks.

JP Morgan primarily manages our investments, with a small residual private equity investment maintained by Schroders Investment Management (UK) Limited. Our investment portfolio is split between general funds and restricted funds to maintain appropriate governance and stewardship of funds, while minimising management fees. Risk is managed through diversification of the portfolio between different asset classes and geographic markets, and the wider social and environmental impact of the portfolio is monitored through independently provided Environmental, Social and Governance (ESG) Quality Scores where appropriate.

The portfolio generated investment income of £0.8m in 2021 (2020: £0.9m), all of which was reinvested. Together with investment gains of £6.6m (2020: £8.5m) and investment management costs of £1.5m (2020: £0.6m) the value of our investments increased overall to £122.9m (2020: £117.0m), an increase of £5.9m during the year.

## **Reserves policy**

We review our reserves policy regularly. Our aim is to maintain our reserves at a sufficient level to ensure our financial resilience and sustainability, including protecting us against risks identified in the Risk Register.

Our reserves policy sets out the target reserves level and the key principles by which we will manage any excesses or deficits compared to the target. Our aim is to strike the appropriate balance between ensuring a sustainable financial position and using our funds to fulfil our charitable mission.

Free reserves represent unrestricted general funds of the RSC and exclude both the restricted funds held and funds that have been designated by our Trustees. The free reserves also exclude any funds that could only be realised by disposing of fixed assets held for charitable use.

Free reserves are held to smooth volatility and minimise disruption to RSC activities and:

- provide contingency funding in the event of temporary income disruption
- pay for unbudgeted essential costs, where these cannot be funded by other means
- smooth volatility by giving the organisation time (up to 3 years) to make structural changes on a strategic and phased basis

In 2021, our policy was to maintain free reserves within a target range of  $\pm$ 31.3m to  $\pm$ 34.6m ( $\pm$ 33m +/- 5%) to cover the following contingencies:

- Publishing surplus -25% reduction for 3 years (£15m)
- Non-publishing income -25% reduction for 3 years (£6m)
- Foreign exchange volatility –10% USD devaluation for 3 years (£4m)
- Inescapable costs –5% of operating budget (£3m)
- Investment volatility cushion (£5m)

If free reserves fall below the target range, we will aim to address any deficits within 5 years. If free reserves are above the target range, we will transfer surpluses to designated funds and spend these within 5 years.

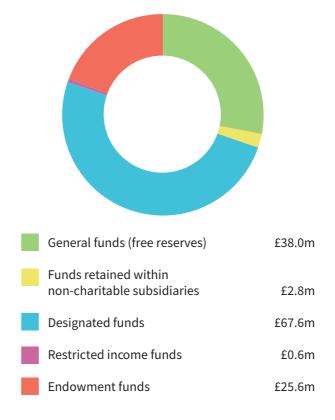
The level of accumulated usable funds held at 31 December 2021 was £108.4m (2020: £105.0m). Of this, £38m (2020: £38m) relates to the Charity's unrestricted general funds and represents the available 'free reserves' available to the group. Our designated funds total £67.6m (2020: £65.2m), which have been earmarked for specific purposes. The balance of £2.8m (2020: £2.2m) relates to funds retained within the group's non-charitable subsidiaries.

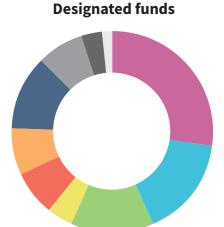
The free reserves figure as at 31 December 2021 is above the target range. This will be addressed in 2022 by allocating funds to charitable activities and organisational improvements.

#### Designated funds

The designated funds consist of earmarked funds totalling £60.3m (2020: £57.7m), designated trust and lecture funds totalling £5.1m (2020: £5.4m) as well as reserves totalling £2.1m (2020: £2.0m) held by branches of the Royal Society of Chemistry including our Local Sections, Regions and Interest Groups. Each of these branches is managed by a committee, which organises activities to advance the chemical sciences in local and specialist areas. Earmarked funds are established by appropriating amounts out of the general funds and are subject to Board of Trustees approval.

### Total usable and restricted funds





Pension long term strategy fund	£18.4m
Strategic initiatives fund	£11.0m
Pension scheme recovery fund	£9.0m
Technology roadmap fund	£2.7m
Fixed assets reserve	£5.0m
Trust and lecture funds	£5.1m
Strategic alignment reserve	£8.0m
New ventures fund	£5.2m
Member networks	£2.1m
TGH repairs fund	£1.1m

#### **Restricted funds**

The total restricted funds, including restricted income and endowment funds, held at 31 December 2021 were £26.2m (2020: £25.2m) and represent income for restricted purposes specified by the donor that are not available for the general purposes of the charity.

Of this, £17.6m (2020: £17.4m) relates to the Chemists' Community Fund (CCF), which provides a flexible range of financial and non-financial help to members and their dependents. The target range for the CCF restricted funds is set at £14.0m to £16.0m. The remainder comprises other restricted income and endowment trust funds totalling £0.6m (2020: £1.6m) and £8.1m (2020: £6.2m) respectively. In October 2021, the Board of Trustees passed a resolution to consolidate a number of trust funds with varying fund classifications spread across designated funds, restricted income funds, expendable and permanent endowments into a new restricted recognition fund.

Our strategy for all of our restricted funds is to maintain capital over the long-term while generating income to meet current and expected expenditure levels.

#### Pensions

Employees who joined from January 2003 are entitled to join a defined contribution pension scheme. For employees who joined prior to that date, we operate a defined benefit scheme, which commits to pay a pension based on the number of years worked and the final salary of the members. This was closed to new members in 2002 and the scheme was closed to future accrual for existing members in 2011.

The Defined Benefit Pension Scheme therefore represents a commitment by the Royal Society of Chemistry to pay members a pension (scheme liability), which is paid from a fund managed by the Pension Fund Trustees (the scheme asset).

We agreed a recovery plan with the Pension Fund Trustees to address the deficit, following the triennial valuation of the pension scheme as at 31 December 2019. This replaces the previous recovery plan agreed on the pension scheme as at 31 December 2016. The funding valuation method is used to determine the recovery plan and the annual deficit payments made by the RSC, and therefore this method has a direct impact on the actual costs falling upon the RSC. In accordance with the recovery plan, the RSC will pay the following contributions per year to 2027 inclusive, when the shortfall is expected to be eliminated.

• January 1 to December 31 2021 : £1,924,000

- January 1 to December 31 2022 : £2,300,000
- January 1 to December 31 2023 : £2,500,000
- January 1 to December 31 2024 : £2,900,000
- January 1 to December 31 2025 : £3,200,000
- January 1 to December 31 2026 : £3,400,000
- January 1 to August 31 2027 : £2,400,000

In addition to these contributions, the RSC have agreed to make further contributions by income sharing each year from 2022. This will be based on Operating Income, 50% of any surplus up to a maximum of £0.5m. The RSC expects to make an additional contribution of £0.5m in May 2022, based on the approval of these Financial Statements.

Accounting rules require the use of an accounting valuation method, which measures the pension fund's assets and liabilities on a different basis to the funding valuation method, and results in a larger deficit. FRS 102 is the accounting standard that dictates how the scheme is presented in the financial statements and the valuation is determined by an actuary. The FRS 102 valuation (accounting valuation) of the deficit on the Defined Benefit Pension Scheme was £27.1m at the end of 2021 (2020: £40.0m). This reduction in the overall net defined benefit pension liability followed a decrease in the liabilities of the scheme of £6.6m, attributable to changes in the actuarial assumptions, most notably the increase in the discount rate from 1.4% to 1.8%, as well as an increase in the value of assets held within the scheme of £6.3m due to investment returns. Both these factors resulted in an overall reduction in the net defined benefit pension liability in 2021.

The accounting valuation results in a notional deficit that does not directly impact on the actual costs falling upon the RSC. The funding valuation is considered the real figure and this, along with the agreed recovery plan, will remain until the next triennial valuation process as at 31 December 2022 takes place in 2023.

The differences between the 2021 accounting valuation and 2019 funding valuation measures of the pensions fund deficit are summarised in the table below:

Details	Accounting valuation 31 Dec 2021 For use in the 2021 financial statements £m	Funding valuation 31 Dec 2019 For use in the recovery plan agreed in October 2020 subject to acceptance by the Pensions Regulator £m	Difference
Scheme assets	112.0	101.8	10.2
Scheme liabilities	(139.1)	(122.7)	(16.4)
Net deficit	(27.1)	(20.9)	(6.2)

Over time, the deficit will vary in line with market interest rates and equity returns and may ultimately become a surplus. Given the length of time over which the scheme will exist, the FRS 102 figures represent only a best estimate of the final position if existing market factors remain unchanged. We are maintaining a separate designated fund, the pension long term strategy fund, with the objective of achieving a permanent settlement of our obligations by means of a buyout transaction. This is estimated to take place in or around the year 2032.

#### Risks

Our Leadership Team regularly review the strategic risks facing the RSC, and oversee plans for mitigating these risks. The formal Strategic Risk Register was updated in May 2021 to align with our new strategy, and will be updated annually.

Strategic risk	Summary
Publishing	To accelerate our transition to Open Access and editorial capabilities. Allowing us to del content and manage our transition to an Op associated with our Open Access transition non-publishing income streams to help dive
Business continuity	We continue to respond to the pandemic, a the safety and wellbeing of our employees, our offices. Work is underway to update our pandemic.
Cyber security	Work towards CyberEssentials certification have also been informed by recommendation
Focus	Our new organisational strategy was appro- purpose, our vision/mission, our business s plans support the priorities for transformat commitment to support our community.
Workforce	We are embracing hybrid working and defir work here. We recognise that the world of w and the impact on employees and how and employee metrics, including turnover and w that we retain and develop our talent. We and challenges and organisation ambitions.
Banking and investments	Our use of bank accounts continues to oper the Finance & Resources Board, which sets security and liquidity. Investments are man approved by the Board of Trustees. The pos meeting of the FRB. The Investment Strateg environmental, social and governance cons and yield appropriate to the current and fut
Estates	The findings of the Future Workplace pilot in drafted in Q1 2022, helping us to deliver our new long-term lease with the property own 2025. Monitoring of our international office of the International Steering Group.
Global Sustainability	The chemical sciences have a critical role to and developing a more circular economy. Th challenges. We are running a programme in sustainability, using COP26 as a springboard commitment, including our operational acti carbon emissions to zero by 2040. We contir alongside a wide range of global partners, to
Reputation	Careful consideration is given to our reputat feedback from key stakeholders. Work has b organisations. In addition, we monitor repu In every decision making process we consid
Financial resilience	The embedding of a rolling budget from 202 changes in cost and income drivers. A refres funds sufficient to address any income shor

The strategic risks and associated mitigations are a standing item in the Audit and Risk Committee agenda, to ensure thorough oversight on behalf of our Trustees.

The key risks faced by the RSC along with their associated mitigations, are summarised in the table below:

and support an Open Science future we are investing in our digital iver compelling author and customer propositions to grow our ben Access model. These investments mitigate the income risks as does the evolving Commercial strategy which seeks to identify ersify the sources of our surplus.

dapting both our workspaces and workplace policies to ensure whilst providing continuity to our business operations across all business continuity plans in the light of our learning from the

continued throughout 2021. Our work in 2021 and future plans ons from our internal auditors.

ved in July. This includes a clear link between our Charter, our trategies and our implementation plans. The budget and financial ion and growth within our strategy, alongside our continued

ing what that means for our organisation and the people who york has fundamentally shifted as a result of the global pandemic why they work is constantly evolving. We regularly review key vellbeing, and benchmark reward against local markets to ensure re investing in key roles for the future to deliver against our people

ate in accordance with the Banking Policy, approved annually by out how cash funds will be distributed between banks to ensure aged within parameters defined in the Investment Strategy ition is kept under close review, including reports to each gy is being reviewed in 2022, to address emerging issues regarding iderations, and to ensure the right balance between risk, volatility rure needs of the organisation.

n the UK will feed into our Global Estates Strategy, which is to be workforce and global sustainability plans. Negotiations into a er for Burlington House continues, with the next renewal due in facilities, leases and operations has been brought under the remit

play in solving the global challenges associated with sustainability ne RSC will only remain relevant if we fully engage with these 2021-2022 focused on accelerating our commitment to I. Building on this, sustainability will be a long-term organisational vity. We have committed to the UN Race to Zero to reduce our net use to use our influence nationally and internationally, working o ensure we have the impact we want to make.

tion at all times, including monitoring via external trackers and begun to protect our reputation when partnering with external tational risks within the professional body and publishing sectors. ler both the positive and negative impact on our reputation.

22 will help resilience through faster iterations in response to hed reserves policy (July 2021) provides for ample contingency tfalls that may arise.

continued >

### Strategic risk Summary

Regulatory

compliance

Policies and procedures remain in place to ensure that current regulatory requirements are fulfilled in all material respects. Relevant external professional bodies are followed closely to ensure any new requirements, are considered and addressed as appropriate. We aim to maintain sufficient knowledge and skills to ensure compliance with our domestic and international regulatory and statutory obligations, including the Bribery Act, Charity Commission requirements, Data Protection, EU GDPR, employee rights, health and safety regulations, international trade sanctions, Modern Slavery Act, Safeguarding Children & Vulnerable Adults, statutory financial reporting, and tax legislation.

## Structure, governance and management

The Royal Society of Chemistry is a registered charity governed by a Royal Charter that was granted on 15 May 1980, following the amalgamation of the Chemical Society, the Royal Institute of Chemistry, the Faraday Society, and the Society for Analytical Chemistry.

We are governed by our Board of Trustees, members of which are elected or appointed in accordance with our charter and by-laws.

### **Our Board of Trustees comprises:**

- President
- President Elect
- Honorary Treasurer
- Seven Elected Trustees
- Up to eight Appointed Trustees, who may be chairs of our boards or other persons appointed by The Board of Trustees.

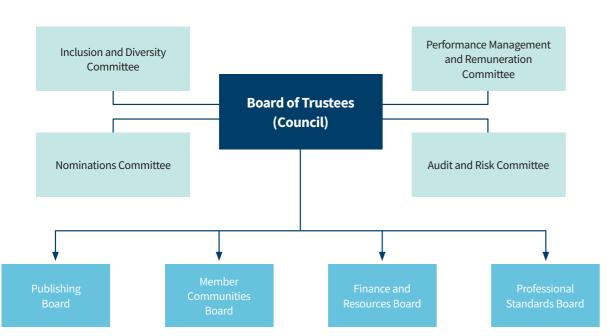
In accordance with the By-laws of the Society, the trustees are elected to position at the Annual General Meeting. Any member of the RSC may stand for election as an Elected Trustees and any Honorary Fellow, Fellow or Member, may stand for election as President. All members are eligible to nominate candidates and vote in elections. Voting takes place electronically and is managed by an external provider approved by the Board of Trustees. Election of Elected Trustees for the Board of Trustees normally takes place every two years. The next election will be for Elected Trustees to take office after the 2023 Annual General Meeting (AGM).

### Our governance structure

Our governance boards and committees develop strategic planning and policies with the support of staff and subject to approval by the Board of Trustees, which delegates the day-to-day management of the organisation and strategy implementation to the Chief Executive Officer (CEO). Members of staff provide updates on progress to the governance bodies, which, in turn, report to the Board of Trustees on performance against our strategy.

Each board and committee has a chair appointed by the Board of Trustees. More details on the current structure and membership of each board can be found on our website:

## http://www.rsc.org/about-us/our-structure/ -boards-committees



#### Our governance structure

## Trustees

At the date of signing the Trustees' Report, the Board of Trustees are the Trustees of the Royal Society of Chemistry. A list of the Trustees for the period from January 2021 to the date of this report is shown on page 42.

All Board of Trustees members are required to attend trustee training sessions covering the responsibilities of trustees, including financial and business planning and strategy development. Trustees are also offered training and are provided with a Governance Handbook and trustee induction pack that they are asked to familiarise themselves with.

We also conduct an annual skills audit to ensure that the Board of Trustees includes the right skills to provide effective strategic direction and oversight for the organisation.

In shaping our objectives for the year and planning our activities, the Trustees have considered the Charity Commission's guidance on public benefit, including the guidance 'public benefit: running a charity (PB2)'. The Trustees are satisfied that the RSC's activities provide public benefit by advancing chemical sciences through publishing chemistry books, journals and magazines; informing and influencing policy makers; supporting and advancing chemical science education; recognising and regulating professional standards in the chemical sciences; organising meetings, conferences and networking events and informing and engaging the public.

All members of the Board of Trustees and its Boards and committees give their time voluntarily to the RSC.

## Remuneration of key management personnel

Our Leadership Team (LT) led by the Chief Executive Officer (CEO), manages the implementation and operational delivery of the RSC's agreed strategy, programmes of activity by promoting leadership and direction, and works closely with the Board of Trustees to ensure we are governed effectively. The Performance Management and Remuneration Committee is responsible for:

- Setting objectives for and reviewing the performance of the CEO, and determining his or her salary in accordance with the organisation's performance management procedures
- On the basis of recommendations from the CEO, discussing and agreeing any major changes to the

duties of senior staff ie the Chief Operating Officer (COO) and the Leadership Team, their annual remuneration and any change in the number of such posts

- Ensuring that appropriate benchmarking is in place to understand how the salary and remuneration packages of the CEO, COO and LT members compare to those in similar organisations
- Providing general advice to the CEO on people management issues, in accordance with by-law 74

Remuneration for the CEO, COO and the LT is reviewed on an annual basis at the same time as the annual pay review for all staff. Please refer to disclosure note 7 for more information on LT remuneration.

## **Subsidiary Companies**

## Overview

The RSC has two wholly owned UK registered subsidiaries, Chemistry Limited and RSC Worldwide Limited. The profit before taxation for Chemistry Limited was £23k (2020: £97k loss). The profit before taxation for RSC Worldwide Limited was £890k (2020: £596k).

The principal activity of RSC Worldwide Limited is to facilitate the RSC's activities overseas. It also holds the ChemSpider asset, a database providing fast text and structure search access to over 100 million chemical structures from hundreds of data sources.

In 2021, RSC Worldwide Limited continued to facilitate operations in the US, China, India, Japan, Brazil and Germany, representing activities to advance the chemical sciences internationally.

The principal activity of Chemistry Limited is to promote Burlington House as a unique venue for both chemistry and non-chemistry related events and to carry out any non-primary purpose trading on behalf of the RSC. The disruption in the events and hospitality sector precipitated by the outbreak of COVID-19 in 2020 led to the temporary closure of the Burlington House venue in March 2020. Burlington House reopened as an events venue in September 2021 and as a consequence of a renewed effort in securing event bookings, Chemistry Limited has ended 2021 with a profit.

### **Consolidation shown on page 48**

We have reflected in the Consolidated Statement of Financial Activities and Balance Sheet the following entities covered by the Royal Society of Chemistry charity registration:

- Chemistry Limited
- RSC Worldwide Limited
- RSC Worldwide (US) Inc.
- RSC (Beijing) Chemical and Science Technology Company Limited
- Royal Chemistry India Private Limited
- · Royal Chemistry India Foundation
- Royal Society of Chemistry Japan KK
- Friends of RSC Inc.
- RSC Worldwide (Germany) GmbH

## **Connected charities**

The RSC jointly administers the Sir George Beilby Memorial Fund. An annual prize of £1,000 is awarded and sustained by a trust fund commemorating Sir George Beilby FRS, President of the Society for Chemical Industry (SCI) (1898-99), the Institute of Chemistry (1909-12) and The Institute of Metals (1916-1918) and founding Chairman of the Fuel Research Board.

The award is administered in rotation by the RSC, the Institute of Materials, Minerals and Mining and the SCI. It recognises substantial work of exceptional practical significance in chemical engineering, applied materials science, energy efficiency or related field, and is made to scientists or engineers. The assets of the fund are held in a named portfolio with Schroders Investment Management Limited. The RSC's share of the fund has not been consolidated within the Consolidated Balance Sheet and Statement of Financial Activities on the basis of materiality.

The RSC works with a broad range of UK and international charities. Details are available on request.

## **Reference and** Administrative Details Charity Registration Number

The Royal Society of Chemistry's charity registration number is 207890 and this registration encompasses the RSC Chemists' Community Fund, the Royal Society of Chemistry and its trust and lecture funds and member networks.

## Leadership Team for the year 1 January 2021 to 31 December 2021

#### **Chief Executive Officer**

Dr Helen Pain CSci CChem FRSC (from June 2021, previously Interim Chief Executive Officer)

## **Chief Operating Officer**

Paul Lewis FRSA FlnstLM (from July 2021, previously Deputy Chief Executive Officer)

**Finance Director** Stephen Joyce FCPFA

**Director of Science and Communities** Dr Jo Reynolds FRSC

**Director of Human Resources** and Organisation Development Karen Roberts MCIPD (retired 31st December 2021)

**Director of Education and Professional Practice** Sarah Robertson FRSC

**Director of Publishing** Dr Emma Wilson MRSC

**Director of Technology** Dr Amanda Spencer

**Director of Sales and Marketing** Stephen Rumbelow (until November 2021)

## Auditors, Bankers and other Professional Advisors

#### Auditors

## **RSM UK Audit LLP**

**Blenheim House** Newmarket Road **Bury St Edmunds** Suffolk IP333SB

## Bankers

#### National Westminster Bank plc

Cambridge Petty Cury Branch 21 Petty Cury Cambridge CB2 3NE

Nationwide Building Society Nationwide House Pipers Way, Swindon SN38 1NW

## **Goldman Sachs Asset Management**

International Plumbtree Court 25 Shoe Lane EC2A 4AU

Citizens One Citizens Plaza, Providence, RI 02903 USA

**Barclays Bank plc** 1 Churchill Place London

Lloyds Bank plc 25 Gresham Street London EC2V7HN

E14 5HP

## Investment managers

J P Morgan 25 Bank Street

Canary Wharf London E14 5JP

## Schroder Investn (UK) Limited 1 London Wall Pla London EC2Y 5AU

## Actuary

Mercer Limited 1 Tower Place West **Tower Place** London EC3R 5BU

## Pension Advisors

Canard Court 23-25 St George's Road Bristol BS1 5UU

## Legal Advisors

Charity, technology, intellectual **Taylor Vinters** Merlin Place Milton Road Cambridge CB4 0DP

## **Publishing matters:**

Farrer & Co. 66 Lincoln's Inn Fields London WC2A3LH

## Commercial, compliance and employment matters:

## Mills & Reeve LLP **Botanic House**

100 Hills Road Cambridge CB2 1PH

nent Management
ice

## **Broadstone Consultants & Actuaries**

property and employment matters:

## Commercial property matters:

**Eversheds** Kett House Station Road Cambridge CB12JY

## Translation and Document Review: Han Kun Law Offices - Shanghai

33/F, HKRI Centre Two HKRI Taikoo Hui, 288 Shimen Road (No.1) Shanghai 200041, P.R. China

## Compliance:

ARC – Arfiff Rozhan & Co Solaris Mont Kiara 50480 Kuala Lumpar Malaysia

## **Property law:**

Peixoto & Cury Rua Teixeira da Silva 560 Sao Paulo

## Safeguarding:

**Mason Haynes and Curran** South Bank House Barrow St Dublin 4

## **Principal Offices**

## **Royal Society of Chemistry**

Burlington House Piccadilly London W1J0BA

## **Royal Society of Chemistry**

Thomas Graham House Science Park Milton Road Cambridge CB4 0WF

## **Our International Offices**

**Tokyo – Japan** Kagakukaikan 3F, 1-5 Kanda-Surugadai, Chiyoda-ku, Tokyo, 101-0062, Japan.

**Beijing – China** Room 606, 6/F, Tower A, Raycom InfoTech Park No. 2 Kexueyuan South Road, Zhongguancun, Haidian District, 100190, Beijing, China

**Shanghai – China** Unit 1216, Level 12, Chong Hing Finance Center, 2 88 Nanjing Road West, Huangpu District, 200003, Shanghai, China

Washington – USA 1050 Connecticut Ave NW, Suite 500 Washington DC 20036

**Philadelphia – USA** University City Science Center, 3675 Market Street, Suite 200 Philadelphia, PA 19104

North Carolina – USA 3110 Edwards Mill Road, Suite 300, Raleigh, North Carolina 27612

**Bangalore – India** 3rd Floor, N-301, World Trade Centre, 26/1, DR. Rajkumar RD Malleshwaram Rajaji Nagar, Brigade Gateway Campus, Bangalore – 560055

New Delhi – India D-74, Diplomatic Enclave, Malcha Marg, New Delhi – 110021

**Berlin – Germany** C/o Satellite Office, Römischer Hof, Unter den Linden 10, 10117 Berlin

## Royal Society of Chemistry Trustees

Patron Her Majesty The Queen

## Board of Trustees Members for the year 1 January 2021 to 31 December 2021

## **Honorary Officers**

President Professor Tom Welton OBE CChem FRSC

President Elect Professor Gill Reid FRSC

Honorary Treasurer and Chair, Finance & Resources Board Claire Gallery-Strong CSci CChem FRSC (from July 2021) Dr Paul Satchell CChem FRSC (retired July 2021)

## **Appointed Trustees**

**Chair, Publishing Board** Professor Duncan Graham CChem FRSC FRSE

**Chair, Member Communities Board** Jonathan Oxley CChem FRSC CMgr FCMI

**Chair, Professional Standards Board** Dr Andy Rudge CSci CChem FRSC

Chair, Inclusion and Diversity Committee Professor Marina Resmini FRSC Dr Annette Doherty OBE FRSC Professor Saiful Islam CChem FRSC Professor Robert Mokaya OBE FRSC (appointed November 2021)

## **Elected Trustees**

Dr Louise Armstrong-Denby CChem FRSC Dr Amanda Cooke MRSC (elected July 2021) Julia Hatto BEM CSci CChem FRSC (retired July 2021) Professor Richard F W Jackson CChem FRSC (elected July 2021) Remya Norris CChem MRSC (elected July 2021) Professor Annie Powell CChem FRSC Dr Elizabeth Rowsell OBE FRSC Professor Jeremy K M Sanders CBE FRSC FRS (elected July 2021) Professor Tom Simpson CChem FRSC FRS FRSE (retired July 2021)

All the members named above, except for those who retired in 2021, form the Board of Trustees as at the date of signing the Trustees' report.

## **Responsibilities of the Trustees**

## Statement of Trustees' responsibilities in respect of the Trustees' report and the accounts

The Trustees are responsible for preparing the Trustees' report and the financial statements in accordance with applicable law and United Kingdom Accounting Standards (United Kingdom Generally Accepted Accounting Practice).

The law applicable to charities in England and Wales requires the Trustees to prepare financial statements for each financial year that give a true and fair view of the state of affairs of the group and the charity and of the incoming resources and application of resources of the group for that period. In preparing those financial statements, the Trustees are required to:

- Select suitable accounting policies and apply them consistently;
- Observe the methods and principles in the Charities Statement of Recommended Practice (SORP);
- Make judgements and estimates that are reasonable and prudent;
- State whether applicable UK accounting standards have been followed, subject to any material departures disclosed and explained in the financial statements; and
- Prepare the financial statements on the going concern basis unless it is inappropriate to presume that the Royal Society of Chemistry will continue in business.

The Trustees are responsible for keeping proper accounting records that disclose with reasonable accuracy at any time the financial position of the group and the charity and to enable them to ensure that the financial statements comply with the Charities Act 2011, the Charity (Accounts and Reports) Regulations 2008 and the provisions of the Royal Charter. They are also responsible for safeguarding the assets of the group and the charity, and hence for taking reasonable steps for the prevention and detection of fraud and other irregularities.

The Trustees are responsible for the maintenance and integrity of the charity and financial information included on the charity's website. Legislation in the United Kingdom governing the preparation and dissemination of financial statements may differ from legislation in other jurisdictions.

On behalf of the Trustees

Professor Tom Welton OBE CChem FRSC

## Independent Auditors' Report to the Trustees of the Royal Society of Chemistry

## Opinion on the financial statements

We have audited the financial statements of the Royal Society of Chemistry (the 'parent charity') and its subsidiaries (the 'group') for the year ended 31 December 2021 which comprise the Group Statement of Financial Activities, the Group and parent charity Balance Sheets, the Group Cash Flow Statement and notes to the financial statements, including significant accounting policies. The financial reporting framework that has been applied in their preparation is applicable law and United Kingdom Accounting Standards, including FRS 102 "The Financial Reporting Standard applicable in the UK and Republic of Ireland" (United Kingdom Generally Accepted Accounting Practice).

In our opinion the financial statements:

- give a true and fair view of the state of the group's and charity's affairs as at 31 December 2021 and of their incoming resources and application of resources for the year then ended;
- have been properly prepared in accordance with United Kingdom Generally Accepted Accounting Practice; and
- have been prepared in accordance with the requirements of the Charities Act 2011.

## **Basis for opinion**

We have been appointed as auditors under section 151 of the Charities Act 2011 and report in accordance with regulations made under section 154 of that Act.

We conducted our audit in accordance with International Standards on Auditing (UK) (ISAs (UK)) and applicable law. Our responsibilities under those standards are further described in the Auditor's responsibilities for the audit of the financial statements section of our report. We are independent of the group and parent charity in accordance with the ethical requirements that are relevant to our audit of the financial statements in the UK, including the FRC's Ethical Standard and we have fulfilled our other ethical responsibilities in accordance with these requirements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

## Conclusions relating to going concern

In auditing the financial statements, we have concluded that the trustees' use of the going concern basis of accounting in the preparation of the financial statements is appropriate.

Based on the work we have performed, we have not identified any material uncertainties relating to events or conditions that, individually or collectively, may cast significant doubt on the group's or parent charity's ability to continue as a going concern for a period of at least twelve months from when the financial statements are authorised for issue.

Our responsibilities and the responsibilities of the trustees with respect to going concern are described in the relevant sections of this report.

## Other information

The other information comprises the information included in the Trustees' Report other than the financial statements and our auditor's report thereon. The trustees are responsible for the other information contained within the Trustees' Report. Our opinion on the financial statements does not cover the other information and, we do not express any form of assurance conclusion thereon.

Our responsibility is to read the other information and, in doing so, consider whether the other information is materially inconsistent with the financial statements or our knowledge obtained in the course of the audit or otherwise appears to be materially misstated. If we identify such material inconsistencies or apparent material misstatements, we are required to determine whether this gives rise to a material misstatement in the financial statements themselves. If, based on the work we have performed, we conclude that there is a material misstatement of this other information, we are required to report that fact.

We have nothing to report in this regard.

## Matters on which we are required to report by exception

We have nothing to report in respect of the following matters where the Charities Act 2011 requires us to report to you if, in our opinion:

- the information given in the financial statements is inconsistent in any material respect with the Trustees' Report; or
- sufficient accounting records have not been kept by the parent charity; or
- the parent charity financial statements are not in agreement with the accounting records and returns; or
- we have not received all the information and explanations we require for our audit.

## **Responsibilities of trustees**

As explained more fully in the Statement of Trustees' responsibilities set out on page 43, the trustees are responsible for the preparation of the financial statements and for being satisfied that they give a true and fair view, and for such internal control as the trustees determine is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the financial statements, the trustees are responsible for assessing the group's and parent charity's ability to continue as a going concern, disclosing, as applicable, matters related to going concern and using the going concern basis of accounting unless the trustees either intend to liquidate the group or parent charity or to cease operations, or have no realistic alternative but to do so.

## Auditor's responsibilities for the audit of the financial statements

Our objectives are to obtain reasonable assurance about whether the financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with ISAs (UK) will always detect a material misstatement when it exists.

Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these financial statements.

## The extent to which the audit was considered capable of detecting irregularities, including fraud

Irregularities are instances of non-compliance with laws and regulations. The objectives of our audit are to obtain sufficient appropriate audit evidence regarding compliance with laws and regulations that have a direct effect on the determination of material amounts and disclosures in the financial statements, to perform audit procedures to help identify instances of non-compliance with other laws and regulations that may have a material effect on the financial statements, and to respond appropriately to identified or suspected non-compliance with laws and regulations identified during the audit.

In relation to fraud, the objectives of our audit are to identify and assess the risk of material misstatement of the financial statements due to fraud, to obtain sufficient appropriate audit evidence regarding the assessed risks of material misstatement due to fraud through designing and implementing appropriate responses and to respond appropriately to fraud or suspected fraud identified during the audit.

However, it is the primary responsibility of management, with the oversight of those charged with governance, to ensure that the entity's operations are conducted in accordance with the provisions of laws and regulations and for the prevention and detection of fraud.

In identifying and assessing risks of material misstatement in respect of irregularities, including fraud, the group audit engagement team:

- obtained an understanding of the nature of the sector, including the legal and regulatory frameworks, that the group and parent charity operate in and how the group and parent charity is complying with the legal and regulatory frameworks;
- inquired of management, and those charged with governance, about their own identification and assessment of the risks of irregularities, including any known actual, suspected or alleged instances of fraud;
- discussed matters about non-compliance with laws and regulations and how fraud might occur including assessment of how and where the financial statements may be susceptible to fraud.

As a result of these procedures we consider the most significant laws and regulations that have a direct impact on the financial statements are FRS 102, Charities SORP (FRS 102), Charities Act 2011, the parent charitable company's governing document and tax legislation. We performed audit procedures to detect non-compliances which may have a material impact on the financial statements which included reviewing the financial statements including the Trustees' Report, and remaining alert to new or unusual transactions which may not be in accordance with the governing document.

The most significant laws and regulations that have an indirect impact on the financial statements are those in relation to data protection, sanctions and anti-money laundering and safeguarding. We performed audit procedures to inquire of management and those charged with governance whether the group is in compliance with these law and regulations.

The group audit engagement team identified the risk of management override of controls as the area where the financial statements were most susceptible to material misstatement due to fraud. Audit procedures performed included but were not limited to testing manual journal entries and other adjustments, evaluating the business rationale in relation to any significant, unusual transactions and transactions entered into outside the normal course of business, challenging judgments and estimates. A further description of our responsibilities for the audit of the financial statements is provided on the Financial Reporting Council's website at http://www.frc.org.uk/ auditorsresponsibilities. This description forms part of our auditor's report.

## Use of Our Report

This report is made solely to the charity's trustees as a body, in accordance with the Charities Act 2011. Our audit work has been undertaken so that we might state to the charity's trustees those matters we are required to state to them in an auditor's report and for no other purpose. To the fullest extent permitted by law, we do not accept or assume responsibility to anyone other than the charity and the charity's trustees as a body, for our audit work, for this report, or for the opinions we have formed.

RSM UK Audit LLP

## **RSM UK Audit LLP**

Statutory Auditor, Chartered Accountants Blenheim House. Newmarket Road, Bury St Edmunds, Suffolk, IP33 3SB

#### Date: 28 April 2022

RSM UK Audit LLP is eligible to act as an auditor in terms of section 1212 of the Companies Act 2006.





# FINANCIAL STATEMENTS

## Consolidated statement of financial activities for the year ended 31 December 2021

		Unrestricted funds Restricted funds								
	Note	General funds 2021 £000	Designated funds 2021 £000	Total general and designated funds 2021 £000	Pension reserve 2021 £000	Total unrestricted funds 2021 £000	Restricted income funds 2021 £000	Endowment funds 2021 £000	Total restricted funds 2021 £000	Total 2021 £000
Income and endowments from:										
Donations and legacies	1	407	56	463	-	463	63	62	125	588
Other trading activities	2	49	-	49		49	-	-	-	49
Investment income	3	479	153	632	-	632	173	-	173	805
Charitable activities										
Membership		4,095	9	4,104		4,104	-	-	-	4,104
Chemistry World		959	-	959	-	959	-	-	-	959
Scientific conferences and events		195	196	391	-	391	76	-	76	467
Education and professional practice		172	-	172	-	172	186	-	186	358
Publishing		56,299	1	56,300	-	56,300	-	-	-	56,300
Advocacy and awareness		26	-	26		26	-		-	26
Other income		19	-	19	-	19	-	-	-	19
Total income and endowments		62,700	415	63,115	-	63,115	498	62	560	63,675
Expenditure on:										
Raising funds										
Donations and legacies		343	53	396	4	400	-		-	400
Other trading activities		26	-	26	-	26	-	-	-	26
Investment management costs		911	279	1,190	-	1,190	16	299	315	1,505
Charitable activities										
Membership		3,817	728	4,545	57	4,602	925	-	925	5,527
Chemistry World		2,500	83	2,583	21	2,604	-	-	-	2,604
Scientific conferences and events		1,108	83	1,191	16	1,207	76		76	1,283
Education and professional practice		5,491	412	5,903	59	5,962	239		239	6,201
Publishing		36,927	1,278	38,205	323	38,528	-	-	-	38,528
Advocacy and awareness		7,626	695	8,321	67	8,388	-	-	-	8,388
Total expenditure	8	58,749	3,611	62,360	547	62,907	1,256	299	1,555	64,462
Net income/(expenditure) before investment gains/(losses)		3,951	(3,196)	755	(547)	208	(758)	(237)	(995)	(787)
Gains on investment assets	16	3,912	1,249	5,161		5,161	71	1,390	1,461	6,622
Net income/(expenditure)		7,863	(1,947)	5,916	(547)	5,369	(687)	1,153	466	5,835
Transfer between funds	25, 26	(6,820)	4,341	(2,479)	1,924	(555)	(364)	919	555	-
Net group income/(expenditure) before other recognised gains and losses		1,043	2,394	3,437	1,377	4,814	(1,051)	2,072	1,021	5,835
Remeasurement on defined benefit pension scheme	12	-	-	-	11,455	11,455	-	-	-	11,455
Net movement in funds increase/(decrease)		1,043	2,394	3,437	12,832	16,269	(1,051)	2,072	1,021	17,290
Reconciliation of funds										
Fund balances brought forward		39,754	65,214	104,968	(39,988)	64,980	1,608	23,546	25,154	90,134
Fund balances carried forward		40,797	67,608	108,405	(27,156)	81,249	557	25,618	26,175	107,424

Notes 1–33 form an integral part of these Financial Statements.

Refer to note 32 for the accounting policies that have been used in preparing these financial statements.

A separate statement of financial activities has not been presented for the Charity alone. Refer to note 24 for further disclosure on the Charity's financial outturn for 2021.

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90,134

92,583

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9,021
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388 221 625

2020
£000£
184
124
890
850
4,088
868
381
275
57,889
43
56
64,798

Total

## Consolidated and Charity balance sheets as at 31 December 2021

		Group 2021	Group 2020	Charity 2021	Charit 202
	Note	£000£	£000£	£000£	£00
Fixed assets					
Intangible assets	14	64	129	64	12
Tangible assets	15	4,960	5,631	4,913	5,55
Investments	16	122,946	116,960	122,946	116,96
Total fixed assets		127,970	122,720	127,923	122,64
Current assets					
Debtors	18	15,237	13,154	15,934	13,31
Cash at bank and in hand	10	21,570	24,256	19,111	21,43
Total current assets		36,807	37,410	35,045	34,74
Current liabilities					
Creditors	19	(7,907)	(5,871)	(9,037)	(5,485
Deferred income	19	(21,599)	(23,885)	(21,568)	(23,823
Total current liabilities		(29,506)	(29,756)	(30,605)	(29,308
Net current assets		7,301	7,654	4,440	5,43
Long-term liabilities					
Deferred income	20	(691)	(252)	(691)	(252
Defined benefit pension liability	12	(891) (27,156)	(39,988)	(891)	(39,988
Total long-term liabilities		(27,847)	(40,240)	(27,847)	(40,24
Net assets	21	107,424	90,134	104,516	87,84
Accumulated funds					
Unrestricted funds: Usable funds					
General funds (free reserves)	26	38,010	37,567	38,010	37,56
Funds retained within non-charitable subsidiaries	26	2,787	2,187	-	
Designated funds	26	67,608	65,214	67,608	65,21
Total usable funds		108,405	104,968	105,618	102,78
Unusable funds					
Pension reserve	12, 26	(27,156)	(39,988)	(27,156)	(39,988
Total unusable funds		(27,156)	(39,988)	(27,156)	(39,98
Total unrestricted funds		81,249	64,980	78,462	62,79
Restricted funds:					
Restricted income funds	25	557	1,608	436	1,50
Endowment funds	25	25,618	23,546	25,618	23,54
Total restricted funds		26,175	25,154	26,054	25,04
Total charity funds		107,424	90,134	104,516	87,84

Approved by Board of Trustees and authorised for issue on 28 April 2022

the

Stephen Ige

Tom Welton President

Stephen Joyce Finance Director

Notes 1–33 form an integral part of these Financial Statements.

Refer to note 32 for the accounting policies that have been used in preparing these financial statements.

## Consolidated and Charity statements of cash flows for the year ended 31 December 2021

		Group 2021	Group 2020	Charity 2021	Chari 202
	Note	£000	£000	£000	£00
Reconciliation of net income to net cash outflow from operating activities					
Net income for the reporting period		5,835	9,021	5,221	9,2
Adjustments for:					
Depreciation and amortisation		787	982	752	9
Loss on disposal of fixed assets		-	14	-	
(Gains) on investments	16	(6,622)	(8,510)	(6,622)	(8,5
Investment income	3	(805)	(890)	(805)	(8
Investment management fees deducted from investments		1,471	690	1,471	e
Increase in debtors		(2,083)	(1,705)	(2,621)	(1,7)
Increase/(Decrease) in creditors and accruals		2,036	56	3,552	(6
(Decrease)/Increase in deferred income		(1,847)	2,756	(1,816)	2,7
Receipt of endowment		(62)	(56)	(62)	(
Exchange rate movements on cash and cash equivalents		9	235	21	2
Employer's contributions payable to the defined benefit pension scheme	12	(1,924)	(1,924)	(1,924)	(1,9
Net pension interest expense	12	547	615	547	6
Net cash (outflow)/inflow from operating activities		(2,658)	1,284	(2,286)	6
Cash flows from investing activities					
Investment income	3	805	890	805	:
Investment income reinvested	16	(805)	(890)	(805)	(8
Purchase of investments	16	(30)	(3,024)	(30)	(3,0
Proceeds from sale of investments	16		3,000		3,0
Purchase of tangible fixed assets	15	(51)	(326)	(45)	(3
Net cash inflow from investing activities		(81)	(350)	(75)	(3
Cash flows from financing activities					
Receipt of endowment		62	56	62	
Net cash inflow from financing activities		62	56	62	
(Decrease)/increase in cash and cash equivalents		(2,677)	990	(2,299)	
Cash and cash equivalents at the beginning of the reporting period		24,256	23,501	21,431	21,2
Change in cash and cash equivalents due to exchange rate movements		(9)	(235)	(21)	(2
Cash and cash equivalents at the end of the reporting period		21,570	24,256	19,111	21,4
Analysis of changes in net debt		Group	Group	Charity	Cha
		2021	2020	2021	2
		£000	£000	£000	£
Cash and Cash Equivalents					
Cash and cash equivalents at the start of the reporting period		24,256	23,501	21,431	21,
Cash flows		(2,677)	990	(2,299)	
Non cash flows		(2,011)	(235)	(2,233)	(2
Cash and cash equivalents at the end of the reporting period		21,570	24,256	19,111	21

A reconciliation of net debt is required per the Charities SORP (FRS 102). There was no debt within the group during 2021 (2020: Nil), and there were no non-cash flows to reflect other than the change in cash and cash equivalents due to exchange rate movements.

Notes 1–33 form an integral part of these Financial Statements. Refer to note 32 for the accounting policies that have been used in preparing these financial statements.

## NOTES TO THE FINANCIAL STATEMENTS

## 1. Donations and legacies

	General funds	Designated funds	Restricted income funds	Endowment funds	2021 Total	2020 Total
	£000	£000£	£000£	£000£	£000£	£000
Donations	318	56	63	2	439	146
Bequests and legacies	89	-	-	60	149	38
Total	407	56	63	62	588	184

## 2. Income from other trading activities

Income from other trading activities consists entirely of turnover from Chemistry Limited, a wholly owned trading subsidiary of the RSC. Its principal activity is to promote Burlington House as a unique venue for both chemistry and non-chemistry related events and to carry out any non-primary purpose trading on behalf of the RSC. All the profit from the trading subsidiary is passed to the charity under the gift aid scheme. The disruption in the events and hospitality sector precipitated by the outbreak of the COVID-19 virus in 2020 led to the temporary closure of the Burlington House venue from March 2020 through to September 2021. As a consequence, there was a suspension in trading activity which caused a loss for Chemistry Limited for the 2020 financial year. The re opening of the venue from September 2021 has seen bookings resume, and as at the 2021 year end Chemistry Limited has seen a small profit (see note 17).

## 3. Investment income

	General funds	Designated funds	Restricted income funds	2021 Total	2020 Total
	£000	£000	£000	£000	£000
Assets in the UK					
Fixed interest	-	-	8	8	18
Assets outside the UK					
Interest	-	-	-	-	7
Fixed income	376	121	135	632	639
Equities	58	18	14	90	132
Alternative Investments	45	14	16	75	94
Total	479	153	173	805	890

## 4. Government grants

The RSC receives grant funding from national and international governmental bodies. In 2021 £190k of government funding was recognised in the statement of financial activities (2020: £115k) for education related and teaching training programmes. Funds have been used for the RSC's Initial Teacher Training Scholarship scheme which offers packages of support to eligible trainee chemistry teachers. We have also received funds to support a UK-India Innovation and Sustainable Chemistry Consortium project.

## 5. Analysis of grant expenditure (Group and Charity)

	Grants to institutions 2021		Total 2021	Grants to institutions 2020	Grants to individuals 2020	Total 2020
	£000	£000£	£000	£000	£000	£000
Hardship	-	365	365	-	322	322
Prizes & Awards	100	222	322	-	377	377
Travel & Divisons	-	-	-	3	28	31
Research	-	1,497	1,497	600	421	1,021
Diversity	-	188	188	31	110	141
Education & Outreach	371	372	743	206	427	633
Industry	162	-	162	163	8	171
Intl Engagement	33	20	53	48	29	77
Member Network Grants	160	-	160	285	-	285
Total	826	2,664	3,490	1,336	1,722	3,058

The RSC provides grants through the Chemists' Community Fund, with its primary purpose being the prevention and relief of poverty of its members. As a secondary purpose, the Chemists' Community Fund is used for the benefit of other legally charitable purposes insofar as funds not being required for the primary purpose.

To help promote excellence in chemistry, the RSC also funds a number of prizes and awards as well as providing grants to fund travel to events and conferences. No travel grants given in 2021 (2020 £30k).

## 6. Funding activities outturn analysis

	Note	General funds	Designated funds	Restricted income funds	Endowment funds	2021 Total	2020 Total
		£000	£000£	£000	£000	£000£	£000
Funding activity income							
Donations and legacies	1	407	56	63	62	588	184
Restricted grant income	25	-	-	325	-	325	262
Total		407	56	388	62	913	446
Funding activity costs							
Direct staff costs	8	(178)	-	-	-	(178)	(159)
Direct and support costs	8	(169)	(53)	-	-	(222)	(230)
Total		(347)	(53)	-	-	(400)	(389)
Net income from funding activit	ties	60	3	388	62	513	57

The RSC receives donations and legacies as well as restricted income including grants as part of its funding activities. This table provides an outturn analysis of the income generated through our funding activites and the associated costs incurred on raising funds. The RSC operates a research fund which provides grants to promote original research in the science of chemistry, as explained in note 28. Block pay research grants scheme, previously awarded to institutions (2020: £600k) then split between multiple beneficiaries, stopped in 2021 and was replaced by a higher number of individual research grants at no more than £10k per individual (2020 £10k).

## 7. Total staff costs

	2021	2020
	£000	£000£
Gross wages and salaries	24,921	25,131
National insurance	2,547	2,591
Pension and related cost	2,536	2,482
Redundancy payments	· · · · · · · · · · · · · · · · · · ·	7
Other payments	654	742
Temporary staff and contractors	140	107
Total	30,798	31,060

As required by FRS 102, an amount of £299k (2020: £397k) relating to holiday pay owed to staff at 31 December 2021 has been accrued for. A total of £26k (2020: £61k) was paid in relation to compensation for loss of earnings under agreed settlement agreements. There were no outstanding obligations at year end.

In 2021 the RSC paid a total of £Nil (2020: £7k) in respect of statutory and other employment severance-related payments. The number of employees across the Group who earned more than £60k during the year (including taxable benefits in kind, but excluding employer pension costs) is shown below:

Employee earnings	Number of employees 2021	Number of employees 2020
£60,000 - £69,999	39	34
£70,000 - £79,999	18	14
£80,000 - £89,999	4	4
£90,000 - £99,999	5	1
£100,000 - £109,999	2	3
£110,000 - £119,999	2	2
£120,000 - £129,999	3	5
£130,000 - £139,999	1	1
£140,000 - £149,999	1	1
£150,000 - £159,999	1	-
£160,000 - £169,999	1	1
£170,000 - £179,999	1	-
£180,000 - £189,999		1
£190,000 - £199,999		1
£210,000 - £219,999	1	1
Total	79	69

The number of employees who earned more than £60k, for whom pension benefits are accruing under the RSC defined contribution scheme is 71 (2020: 58). 8 employees (2020: 11 employees) did not accrue pension benefits under the RSC defined contribution scheme. The key management personnel of the RSC comprises the trustees and the leadership team. Key management personnel are in charge of directing and controlling the charity and running and operating the charity on a day to day basis. All trustees give their time freely and no trustee remuneration was paid in the year. Details of trustee expenses and related party transactions are disclosed in note 31 to the accounts. Total employee benefits of £1,361k (2020: £1,577k) were paid to the RSC's leadership team personnel in 2021. Employer national insurance contributions of £127k (2020: £174k) were paid over to HMRC in respect of RSC leadership team personnel. The leadership team consisted of 9 personnel in 2021 (2020: 10 personnel). During 2021, the three roles of CEO and two Deputy CEOs were consolidated into the two roles of CEO and Chief Operating Officer.

#### Average monthly headcount (number of staff employed)

	2021	2020
Membership	45	39
Chemistry World	16	17
Scientific conferences and events	14	14
Education and professional practice	59	63
Publishing	287	289
Advocacy and awareness	54	53
Support	145	149
Fundraising	4	3
Total	624	627
Average monthly FTE		
	2021	2020
Total average FTE	597	599

## 8. Total expenditure

#### Unrestricted funds

	General funds				Designated					
	Direct staff	Direct	Support	Total general	Direct staff	Direct	Support	Total designated	2021	202
	costs	costs	costs	fund costs	costs	costs	costs	fund costs	Total	Tot
	£000	£000	£000	£000	£000	£000	£000	£000	£000	£00
Expenditure on raising	; funds									
Donations and legacies	178	48	121	347	-	38	15	53	400	38
Other trading activities	-	20	6	26	-	-	-	-	26	22
Investment management costs	-	911		911	-	279	-	279	1,190	49
Total	178	979	127	1,284	-	317	15	332	1,616	1,10
Charitable activities										
Membership	1,363	771	1,740	3,874	-	506	222	728	4,602	4,90
Chemistry World	872	1,002	647	2,521	-	-	83	83	2,604	2,63
Scientific conferences and events	367	272	485	1,124	21	-	62	83	1,207	1,19
Education and professional practice	2,061	1,668	1,821	5,550	122	58	232	412	5,962	6,15
Publishing	13,325	13,988	9,937	37,250	-	14	1,264	1,278	38,528	39,28
Advocacy and awareness	2,685	2,945	2,063	7,693	180	252	263	695	8,388	7,83
Total	20,673	20,646	16,693	58,012	323	830	2,126	3,279	61,291	62,0
Total expenditure	20,851	21,625	16,820	59,296	323	1,147	2,141	3,611	62,907	63,11

Direct costs also include foreign exchange charge of £873k (2020: Charge of £675k) and doubtful debt expenditure of £16k (2020: £1,622k), which is the net of debt write offs of

#### Restricted funds

Restricted funds										
		Restricted inc	ome funds			Endowmer	nt funds			
	Direct staff costs	Direct costs	Support costs	Total restricted income fund costs	Direct staff costs	Direct costs	Support costs	Total endowment fund costs	2021 Total	2020 Total
	£000£	£000£	£000£	£000£	£000£	£000	£000£	£000£	£000	£000
Expenditure on raising funds										
Investment management costs	-	16	-	16	-	299	-	299	315	130
Total	-	16	-	16	-	299		299	315	130
Charitable activities										
Membership	338	587	-	925	-	-	-	-	925	713
Scientific conferences and events	5	71	-	76	-	-	-	-	76	52
Education and professional practice	65	173	1	239	-	-	-		239	274
Publishing	-	-	-		-	-	-		-	1
Total	408	831	1	1,240	-	-	-	-	1,240	1,040
Total resources expended	408	847	1	1,256	-	299	-	299	1,555	1,170

Defined contributions and other pension related costs totalling £2,536k (2020: £2,486k) are included within direct staff costs charged to general funds and restricted income funds. £1,204k (2020: £847k) and doubtful debt provision releases during the year of £1,188k (2020: Charge of £775k).

## 9. Support costs

	Management	Finance	Information technology	Comms	Human resources	Accomm.	Governance	2021 Total	2020 Total
	£000	£000	£000£	£000	£000	£000	£000	£000	£000
Basis of allocation	Head count	Head count	Head count	Head count	Head count	Head count	Head count		
Donations and legacies	6	24	58	9	20	18	2	137	138
Other trading activities	-	-	-	-	-	-	6	6	6
Membership	83	344	827	136	283	256	34	1,963	1,691
Chemistry World	31	128	308	50	105	95	13	730	731
Scientific conferences and events	23	96	231	38	79	71	9	547	503
Education and professional practice	87	360	865	142	296	268	36	2,054	2,194
Publishing	474	1,960	4,709	772	1,611	1,457	216	11,199	11,267
Advocacy and awareness	99	408	980	161	335	303	40	2,326	2,285
Total	803	3,320	7,978	1,308	2,729	2,468	356	18,962	18,815

## 10. Governance costs

		2021	2020
	Note	£000£	£000£
Trustee expenses	31	2	6
Legal fees		2	-
Audit and accounting fees	See below	137	123
Governance support costs		215	238
Total		356	367

#### Analysis of auditor's remuneration

	2021	2020
	£000£	£000
Breakdown of audit and accounting fees:		
RSC charity and consolidated accounts external audit fees	60	58
Other RSC charity external audit work, including grant audits	4	4
Tax and advisory services	22	20
International external audit work	12	12
Internal audit and risk assurance services	39	29
Total	137	123

The RSC's internal policy on the 'use of external auditors to provide non-audit services', limits the amount of nonaudit services that can be commissioned without Audit Committee pre-approval to 50% of the average of the previous three years' audit fee. A total of £22k (2020: £20k) of non-audit services have been billed in 2021, which is below the policy threshold for 2021 of £30k.

## 11. Outturn per charitable activity

	2021				2020	
	Income £000	Expenditure £000	Net income/ (expenditure) £000	Income £000	Expenditure £000	Net income/ (expenditure) £000
Donations and legacies	588	(400)	188	184	(388)	(204)
Other trading activities	49	(26)	23	124	(221)	(97)
Investments	805	(1,505)	(700)	890	(625)	265
Membership	4,104	(5,527)	(1,423)	4,088	(5,618)	(1,530)
Chemistry World	959	(2,604)	(1,645)	868	(2,636)	(1,768)
Scientific conferences and events	467	(1,283)	(816)	381	(1,245)	(864)
Education and professional practice	358	(6,201)	(5,843)	275	(6,433)	(6,158)
Publishing	56,300	(38,528)	17,772	57,889	(39,282)	18,607
Advocacy and awareness	26	(8,388)	(8,362)	43	(7,839)	(7,796)
Other	19	-	19	56	-	56
Total	63,675	(64,462)	(787)	64,798	(64,287)	511

## 12. Pension fund

## Group and Charity

The RSC operates a defined benefit scheme in the UK. This is a fund, administered by independent and separate trustees, holding the pension scheme assets to meet long term pension liabilities. A full actuarial valuation was carried out at 31 December 2019 by a qualified actuary, independent of the scheme's sponsoring employer. The major assumptions used by the actuary are shown in this note. The most recent actuarial valuation showed a deficit of £20,922k. The RSC has agreed with the trustees that it will aim to eliminate the deficit by annual payments as per an agreed recovery plan for a period of 7 years and 8 months from 1 January 2021 to 31 August 2027. Furthermore, from 2022 the RSC has agreed to make further contributions by income sharing. Based on operating income, 50% of any surplus up to a maximum of £0.5m will be payable following the approval of the prior year accounts.

As per the Recovery plan, the RSC expects to make an additional contribution of £0.5m in May 2022, based on these approved Financial Statements.

In addition, the RSC earmarked £15m in 2018 to facilitate a buyout transaction in 2032, which will provide a permanent resolution to the defict and fully discharge the RSC's obligations to the defined pension fund.

#### Defined benefit scheme: employee benefit obligations

Present value of funded obligations

Fair value of scheme assets

Net liability

Defined benefit scheme: Statement of financial activities impact

Net interest cost

Total expense

Defined benefit scheme: Amount recognised in the Statement of financial activities after

Remeasurement on defined benefit scheme liability Net cumulative actuarial losses In 2020 the RSC transferred a further £9m to a new designated fund to ensure we can meet our remaining contractual commitments in the recovery plan. Refer to note 26 for more detail.

The difference of £6,234k between the triennial actuarial valuation net liability of £20,922k and the FRS 102 net liability of £27,156k shown in these financial statements arises due to differences in the dates at which the respective valuations took place and the differences in the valuation basis applied. The triennial actuarial valuation (carried out at 31 December 2019) allows for the actual investments in which the Scheme is invested, and these expected returns are used to discount the liabilities. In contrast the FRS 102 valuation (carried out as at 31 December 2021) discounts the liabilties using the yield on high quality corporate bonds as required by accounting standards. The Scheme's investments would be expected to return more than corporate bonds, allowing a higher discount rate to be used, resulting in lower obligation liabilities compared to the FRS 102 accounting basis of valuation.

The RSC also operates a defined contribution scheme. The contributions are administered by investment managers on behalf of the employees. The cost for the year to the employer was £2,502k (2020: £2,442k).

2020	2021
£000	£000
(145,680)	(139,114)
105,692	111,958
(39,988)	(27,156)
2020	2021
£000	£000
(615)	(547)

net income	e/(expenditure)	
	2021	2020
	£000	£000
	11,455	(11,470)
	(26,143)	(37,598)

## 12. Pension fund (continued)

Defined benefit scheme: Amount recognised in the Statement of financial activities after net income/(expenditure)

	2021	2020
	£000	£000£
Change in the present value of the defined benefit obligation:		
Opening defined benefit obligation	(145,680)	(131,764)
Interest expense	(2,016)	(2,731)
Actuarial gains/(losses)	5,150	(14,584)
Benefits paid	3,432	3,408
Losses due to benefit changes	-	(9)
Closing defined benefit obligation	(139,114)	(145,680)

#### Change in the fair value of plan assets:

Closing defined benefit obligation	111,958	105,692
Benefits paid	(3,432)	(3,408)
Contributions by employer	1,924	1,924
Return on plan assets less interest income	6,305	3,114
Interest Income	1,469	2,125
Opening fair value of plan assets	105,692	101,937

The actual return on the plan assets over the period ended 31 December 2021 was £7,774k (31 December 2020: £5,239k).

#### Defined benefit scheme: Principal actuarial assumptions at the balance sheet date

	At 31/12/2021	At 31/12/2020
	%	%
Rate of discount	1.80	1.40
nflation (RPI)	3.45	3.00
nflation (CPI)	2.45	2.00
Salary increases	n/a	n/a
Illowance for revaluation of deferred pensions of CPI or 5% p.a. if less	2.45	2.00
Illowance for revaluation of deferred pensions of CPI or 2.5% p.a. if less	2.45	2.00
Illowance for pension in payment increases of RPI or 5% p.a. if less	3.25	2.90
llowance for pension in payment increases of RPI or 3.5% p.a. if less	2.75	2.55
Allowance for commutation of pension for cash at retirement	90% take-up	90% take-up

#### Defined benefit scheme: The mortality assumptions adopted at 31 December imply the following life expectancies:

	Life expectancy (years) At 31/12/2021	Life expectancy (years) At 31/12/2020
Male retiring in 2020 (2019)	27.0	27.0
Female retiring in 2020 (2019)	28.9	28.9
Male retiring in 2040 (2039)	28.5	28.5
Female retiring in 2040 (2039)	30.5	30.4

#### Defined benefit scheme: assets in the plan as a percentage of total plan assets

	At 31/12/2021 Ai	
Equity instruments and Other	80%	68%
Debt instruments	18%	31%
Cash	2%	1%

#### Defined benefit scheme: Movement in net liability during the year

	2021	2020
	£000	000£
Net liability at beginning of the year Movement in year	(39,988)	(29,827)
Employer's contributions Interest Income Return on plan assets less interest income Interest on pension liabilities Experience gains arising on the plan liabilities Changes in assumptions underlying the plan liabilities	1,924 1,469 6,305 (2,016) (358) 5,508	1,924 2,125 3,114 (2,740) 1,016 (15,600)

Total movement	12,832	(10,161)
Deficit in plan at end of the year	(27,156)	(39,988)
Defined contribution scheme		
	2021	2020
	000£	£000
Employer's contributions	2,502	2,442

## 13. Operating leases

Charges under operating leases to the Statement of Financial Activities during the year was £74k (2020: £85k).

Group and charity

Leases payments:	
Within a year	
Within two to five years	
Later than five years	

The RSC, along with the four other courtyard societies, continues to be in negotiation with the landlord on the renewal of the lease of Burlington House. The accounts have been prepared on the assumption that the RSC will retain use of the property for the foreseeable future.

## 14. Intangible fixed assets

	Index and databases	Web platform	Total
	£000£	£000£	£000
Cost			
Balance at 1 January 2021	1,767	3,657	5,424
Transfers	1	(6)	(5)
Balance at 31 December 2021	1,768	3,651	5,419
ccumulated amortisation			
Balance at 1 January 2021	1,748	3,547	5,295
Charge for Year	3	62	
Transfers	1	(6)	(5)
Balance at 31 December 2021	1,752	3,603	5,355
let book value at 31 December 2021	16	48	64
let book value at 31 December 2020	19	110	129
harity			
	Index and databases	Web platform	Tota
	000£	000£	£000
ost			
alance at 1 January 2020	725	3,657	4,382
Transfers	1	(6)	(5
alance at 31 December 2021	726	3,651	4,377
ccumulated amortisation			
alance at 1 January 2021	706	3,547	4,253
Charge for Year	3	62	
Transfers	1	(6)	(5)
alance at 31 December 2021	710	3,603	4,313
	16	48	64
Net book value at 31 December 2021 Net book value at 31 December 2020	16 19	48	64 129

The intangible asset index relates to the intellectual property rights of the Merck Index acquired for \$750k by the RSC during 2012. The intangible asset database relates to ChemSpider owned by RSC Worldwide Limited and Marin Lit owned by the RSC. RSC Worldwide Limited is a wholly owned subsidiary of the RSC. The web platform provides access to RSC online purchases of journal articles, books, CPD courses and other ecommerce purchases and is owned

## At 31 December the RSC was committed to making the following payments for each of the following periods:

2021	2020
£000£	000£
83	85
15	15
1,079	1,082
1,177	1,182

Current rent payments are made up to date however, future financial commitments relating to Burlington House have not been finalised and therefore are not included above.

by the RSC The amortisation charge for the year is included as part of support costs which in turn are allocated across expenditure headings in the consolidated statement of financial activities, as detailed in notes 8 and 9.

Transfers relate to items which have been reclassified within the Fixed Asset Register during the year and where corrections between cost and accumulated depreciation have taken place.

## 15. Tangible fixed assets

Group			
	Leasehold land and buildings	Fixtures, fittings and equipment	Total
	000£	000£	£000
Cost			
Balance at 1 January 2021	8,435	14,537	22,972
Additions	-	51	51
Disposals	-	(245)	(245)
Transfers	616	(585)	31
Balance at 31 December 2021	9,051	13,758	22,809
Accumulated depreciation			
Balance at 1 January 2020	5,828	11,513	17,341
Disposals	-	(245)	(245)
Charge for year	248	474	722
Transfers	(166)	197	31
Balance at 31 December 2021	5,910	11,939	17,849
Net book value at 31 December 2021	3,141	1,819	4,960
Net book value at 31 December 2020	2,607	3,024	5,631
Charity			
	Leasehold land and buildings	Fixtures, fittings and equipment	Total
Cost	000£	£000	£000
Balance at 1 January 2021	8,433	14,154	22,587
Additions	-	45	
Transfers	618	(603)	15
Balance at 31 December 2021	9,051	13,596	22,647
Accumulated depreciation			
Balance at 1 January 2021	5,828	11,204	17,032
Charge for Year	248	439	687
Transfers	(166)	181	15
Balance at 31 December 2021	5,910	11,824	17,734
Net book value at 31 December 2021	3,141	1,772	4,913
Net book value at 31 December 2020	2,605	2,950	5,555

The RSC has not adopted a revaluation accounting policy and the asset classes disclosed in this note are capitalised at cost. During 2021, a valuation of the Thomas Graham House (TGH) building in Cambridge took place for internal management purposes, and determined that the market value of TGH as at July 2021, assuming a sale with vacant possession, was £20,000k.

Transfers relate to items which have been reclassified within the Fixed Asset Register during the year and where corrections between cost and accumulated depreciation have taken place.

#### **Heritage Assets**

As one of the foremost chemical societies in the world, the RSC is the guardian of an extensive historical collection of over 3,500 books, the oldest of which dates back to 1505, and over 2,000 journals. The collection is primarily composed of materials from the Chemical Society, further augmented by the collections of other societies and further added to by donations, bequests and loans.

The library provides access to items of interest to walk-in visitors, whilst other, older and more valuable items are kept securely elsewhere throughout Burlington House. Many of the items within the collection are irreplaceable originals to which no reliable value can be attributed.

Reliable cost information or comprehensive valuations are not readily available for these assets and such information cannot be obtained at a cost commensurate with the benefit to the users of the accounts and to the RSC. Accordingly, these assets are not capitalised in the financial statements. The Trustees take the view that any further and detailed particulars of the numerous items making up this collection would unduly clutter the accounts and thus detract from their primary purpose.

Due to the importance of the collection the RSC has a policy to not dispose of any items held within it.

There were no additions or disposals in the year (2020: Nil additions or disposals).

## 16. Fixed asset investments

	Unrestricte	d funds	Restricted	funds		
	General funds	Designated funds	Restricted income funds	Endowment funds	2021 Total	20 To
	£000	£000	£000	£000	£000	£0
nvestments listed on recognised stock exchange in the UK						
lixed funds	16,796	5,276	328	7,167	29,567	29,5
nvestments listed on recognised stock exchange outside th	e UK					
ixed income	23,199	7,284	444	8,064	38,991	38,0
quities	12,628	3,962	238	4,631	21,459	17,9
lixed funds	20,314	6,377	331	6,196	33,218	28,2
otal investments listed on recognised stock exchange	72,937	22,899	1,341	26,058	123,235	113,7
Cash held for investment	677	209	207	183	1,276	8
X hedging	(940)	(258)	(18)	(349)	(1,565)	2,3
otal liquid investments	(263)	(49)	189	(166)	(289)	3,2
otal investments	72,674	22,850	1,530	25,892	122,946	116,9
			·			
Novement in market value	Unrestricte	d funds	Restricted	funds		
-	General	Designated	Restricted	Endowment	2021	20
	funds	funds	income funds	funds	Total	Tot
nvestments listed on recognised stock exchange	£000	£000	£000	£000	£000	£0
Market value at 1 January 2021	67,396	21,814	2,364	22,172	113,746	105,9
Realised and unrealised (losses)/gains	6,253	1,942	84	2,240	10,519	7,6
Net transfers to cash held for investment	(712)	(857)	(1,107)	1,646	(1,030)	1
farket value at 31 December 2021	72,937	22,899	1,341	26,058	123,235	113,7
cash and liquid assets held for investment						
Market value at 1 January 2021	1,781	628	212	593	3,214	2,3
Transfers from investments listed on recognised stock exchange	712	857	1,107	(1,646)	1,030	(17
Investment management costs	(911)	(279)	(16)	(299)	(1,505)	(62
Cost accrual movements	32	5	10	(13)	34	(6
Investment income	479	153	173	-	805	8
Add: Capital contributions	(15)	(720)	(1,284)	2,049	30	3,0
Less: Capital distributions	-	-	-	-	-	(3,00
Movements on FX Hedging	(2,341)	(693)	(13)	(850)	(3,897)	8
	(263)	(49)	189	(166)	(289)	3,2
farket value at 31 December 2021	(203)	(10)				

portfolios (2020: £3,000k), and £Nil was deposited in the investment portfolios (2020: £3,024k).

The sum of 'realised and unrealised gains/(losses)' of £10,519k and 'movements on FX hedging' of (£3,897k) equates to a total investment gain of £6,622k for 2021 (2020: £8,510k).

December 2021 is £94,709k (2020: £94,709k).

Performance fees relating to 2020 of £656k were charged to the investment portfolio in June 2021. This arose due to the very strong performance of Hedge Fund assets in 2020.

## 17. Investment in subsidiaries

Charit

	Investment	Capital and Reserves	
	£	£000	
RSC Worldwide Limited*	100	938	
RSC Worldwide (US) Inc**	6,431	555	
RSC Worldwide (Germany) GmbH**	21,869	99	
Chemistry Limited*	2	47	
RSC (Beijing) Chemical and Science Technology Consulting Co., Ltd.**	120,000	893	
Royal Chemistry India Private Limited***	157,272	561	
Royal Society of Chemistry Japan K.K.**	69,729	198	
Royal Chemistry India Foundation****	151	91	
Friends of the RSC, Inc.	-	30	

\* RSC owns 100% of the Issued Share Capital.

\*\* RSC Worldwide Limited owns 100% of the Issued Share Capital.

\*\*\* RSC Worldwide Limited owns 99.99% of the Issued Share Capital.

\*\*\*\* Royal Chemistry India Private Limited owns 100% of the Issued Share Capital.

The Consolidated Balance Sheet incorporates the above balance sheets of these subsidiary companies after elimination of the intercompany debtor and creditor balances due to and from the RSC.

The primary purpose of all subsidiaries with the exception of Chemistry Limited is to promote the RSC and its charitable objectives in different territories of the world.

2021 profit and loss and balance cheet for the charity's controlled subsidiaries

The activities of RSC Worldwide Limited span across publishing, scientific conferences and events.

The principal activity of Chemistry Limited is to promote Burlington House as a unique venue for both chemistry and non-chemistry related events and to facilitate the nonprimary purpose trading of the RSC.

		RSC Worldwide Limited Registered no. 6702733		Chemistry Limited Registered no. 3801760	
	2021	<b>2021</b> 2020		<b>2021</b> 2020	
	£000	£000£	£000£	£000	
Profit and loss account					
Gross income	5,141	5,101	49	124	
Total expenditure	(4,251)	(4,506)	(26)	(221)	
Profit for the financial year	890	595	23	(97)	
Gift aid distributed	(513)	(690)	-	(267)	
Balance sheet					
Aggregate assets	3,641	1,438	296	323	
Aggregate liabilities	(2,703)	(878)	(249)	(300)	
Total funds	938	560	47	23	

The directors of RSC Worldwide Limited and Chemistry Limited have passed a resolution to pay any taxable profits made to the RSC under Gift Aid within 9 months of the year end. In 2021 a total of £513k (2020: £957k) was paid over to the RSC under Gift Aid.

## 18. Debtors

	Group 2021	Group 2020	Charity 2021	Charity 2020
	£000	£000	£000	£000
Trade debtors				
Journal subscriptions	10,734	8,280	10,734	8,28
Journal covers	355	387	354	38
Open access	163	169	163	16
Advertising	203	146	156	12
Book distribution	274	218	274	21
Venue hire	29	17	-	
Other trade debtors	299	377	295	34
Total trade debtors	12,057	9,594	11,976	9,52
Other debtors	1,464	1,568	1,015	1,14
Amounts due from group undertakings		-	1,296	73
Prepayments and accrued income	1,716	1,992	1,647	1,90
Total	15,237	13,154	15,934	13,31

Trade debtors are shown net of doubtful debt provision which totals £255k (2020: £1,444k) for the Group and £207k (2020: £1,466k) for the Charity. A total of £1,188k was released to the SOFA from brought forward Group doubtful debt provisions in 2021 (2020: £775k charged to the SOFA) which reflects the recovery of debts previously provided for.

The bulk of trade debtors relates to journal subscriptions, which total £10,734k (2020: £8,280k). The main reason for the increase in journal subscription debtors compared to the prior financial year is due to the timing of billing where invoices for the 2022 subscription year were issued towards the end of the 2021 financial year.

## 19. Creditors: Amounts falling due within one year

	Group 2021	Group 2020	Charity 2021	Charity 2020
	000£	£000£	£000£	£000
Trade creditors	(1,882)	(832)	(1,809)	(785)
Other creditors	(1,012)	(810)	(897)	(734)
Taxation and social security	(692)	(730)	(687)	(727)
Amounts due to group undertakings		-	(1,593)	(27)
Accruals	(4,321)	(3,499)	(4,051)	(3,212)
Total creditors	(7,907)	(5,871)	(9,037)	(5,485)
Deferred income	(21,599)	(23,885)	(21,568)	(23,823)
Total	(29,506)	(29,756)	(30,605)	(29,308)

Trade creditors have increased by £1,050k compared to 2020. The main reason for the increase is due to the timing of December supplier invoices, which for 2021 were received towards the end of the 2021 financial year resulting in a larger trade creditor balance at year end.

Deferred income in short term creditors represents income from subscriptions relating to the 2022 financial year. Income held in short term deferred income will be recognised in full during the 2022 financial year. The bulk of deferred income falling due within one year relates to journal subscriptions which total £20,139k (2020: £22,475k) for the Group and £20,136k (2020: £22,451k) for the Charity. Substantially all of Total bad debt write-offs of £1,204k (2020: £847k) were charged to expenditure during 2021. The majority of bad debt write-offs relate to long-outstanding journal archive debts dating back to 2019, which were fully provided for in 2020 and therefore the net impact on the SOFA for 2021 was £nil. The largest individual write off amounting to £259k related to a debt held with a corporate agent who went bankrupt during 2020. The RSC recovered 54% of the balance due from the agent with the remainder being provided for in 2020 and written off in 2021.

the deferred income as at 31 December 2020 was released to the Statement of Financial Activities in the year ended 31 December 2021.

Deferred income has decreased by £2,286k compared to 2020. The main reason for the decrease is due to the completion of contracts for the 2022 subscription year being not as advanced as at 31 December compared with the prior year, which in turn were ahead of the historic contract completion and billing cycle. The level of deferred income held on the balance sheet as at 2021 is consistent with the level present in 2019 (pre-COVID).

## 20. Creditors: Amounts falling due after more than one year

	Group 2021	Group 2020	Charity 2021	Charity 2020
	£000£	£000£	£000£	£000£
Deferred income	(691)	(252)	(691)	(252)
Total	(691)	(252)	(691)	(252)

Deferred income in long term creditors represent income from subscriptions relating to the 2023 financial year and beyond and the associated income will be recognised in the financial years to which they relate.

## 21. Analysis of net assets between funds

	Un	restricted funds		Restricted	l funds	
	General funds	Designated funds	Pension reserve	Restricted income funds	Endowment funds	Restated Tota
	£000£	£000£	£000£	£000£	£000£	£000
Fund balances at 31 December 2020 are represented by:						
Tangible fixed assets	-	5,631	-	-	-	5,631
Intangible fixed assets	-	129	-	-	-	129
Investments	69,177	22,442	-	2,576	22,765	116,960
Net current (liabilities)/assets	(29,171)	37,012	-	(968)	781	7,654
Long term creditors	(252)	-	-	-	-	(252)
Pension liability	-	-	(39,988)	-	-	(39,988)
Fotal net assets	39,754	65,214	(39,988)	1,608	23,546	90,134
und balances at 31 December 2021 are represented by:						
Tangible fixed assets	-	4,960	-	-	-	4,960
Intangible fixed assets	-	64	-	-	-	64
Investments	72,674	22,850	-	1,530	25,892	122,946
Net current (liabilities)/assets	(31,186)	39,734	-	(973)	(274)	7,301
Long term creditors	(691)	-	-	-	-	(691)
Pension liability	-	-	(27,156)	-	-	(27,156
otal net assets	40,797	67,608	(27,156)	557	25,618	107,424

Charity

	Un	restricted funds		Restricted	d funds	
	General funds	Designated funds	Pension reserve	Restricted income funds	Endowment funds	Reinstated Total
	£000	£000£	£000£	£000£	£000£	£000
Fund balances at 31 December 2020 are represented by:						
Tangible fixed assets	-	5,555	-	-	-	5,555
Intangible fixed assets	-	129	-	-	-	129
Investments	69,177	22,442	-	2,576	22,765	116,960
Net current (liabilities)/assets	(31,358)	37,088	-	(1,075)	781	5,436
Long term creditors	(252)	-	-	-	-	(252)
Pension liability	-	-	(39,988)	-	-	(39,988)
Total net assets	37,567	65,214	(39,988)	1,501	23,546	87,840
Fund balances at 31 December 2021 are represented by:						
Tangible fixed assets	-	4,913	-	-	-	4,913
Intangible fixed assets	-	64	-	-	-	64
Investments	72,674	22,850	-	1,530	25,892	122,946
Net current (liabilities)/assets	(33,973)	39,781	-	(1,094)	(274)	4,440
Long term creditors	(691)	-	-	-	-	(691)
Pension liability	-	-	(27,156)	-		(27,156)
Total net assets	38,010	67,608	(27,156)	436	25,618	104,516

Tangible and intangible assets are represented within designated funds from 2020 onwards due to a Board of Trustees' resolution to move the balance held within tangible and intangible assets to a specific designated fund to aid transparency of usable general funds.

## 22. Financial derivatives

Forward exchange contracts and forward exchange options are used to manage exposure to currency exchange risk.

Forward contracts to the value of US\$16,000k were entered into during the year ended 31 December 2021 (2020: US \$8,000k). Forward contracts totalling US\$8,750k (2020: US\$9,250k) matured during 2021. As at 31 December 2021 there were forward contracts totalling US\$11,500k which will mature in the next financial year (2020: US\$4,250k). The year end valuation on the open forward contracts resulted in a fair value loss of £419k (2020: gain of £81k).

## 23. Financial Assets and Liabilities

Financial assets measured at fair value through income and expenditure Financial liabilities measured at fair value through income and expenditure

Fixed Asset Investments are valued at quoted prices through the recognised stock exchange in the UK and outside the UK.

The RSC uses forward foreign currency contracts to reduce exposure to foreign exchange rates. The fair value of the

## 24. Royal Society Of Chemistry

Included in the accounts is income of £70,533k (2020: £74,067k) from the RSC as a single entity and a surplus of £5,221k (2020: £9,232k surplus). Forward options were purchased during the year for a combined premium of £Nil (2020: £76k) to provide protection for the sale of US\$Nil (2020: US\$8,000k). During the year, options to sell US\$4,250k were excercised whilst options to sell US\$1,500k lapsed (2020: US\$2,250k) without being exercised due to better spot rates being available at the time of maturity. As at 31 December 2021, the Society held options to sell US\$Nil at protected rates (2020: US\$5,750k).

Group 2021	Group 2020	Charity 2021	Charity 2020
£000£	£000	£000	£000
122,946 (419)	117,085	122,946 (419)	117,085

forward currency contracts is calculated by reference to current forward exchange contracts with similar maturity profiles.

## 25. Restricted funds

#### Group - movement in funds

		Rest	ricted income funds				Endowment	funds	
	Chemists' Community Fund	Trust and lecture funds	Grant income	Friends of the RSC, Inc.	Royal Chemistry India Foundation	Total restricted income funds	Chemists' Community Fund	Trust and lecture funds	end
	£000£	£000	£000	£000	£000	£000	£000	£000	
Balance at 1 January 2020	342	1,413	28	30	132	1,945	16,313	5,811	
Income	136	57	184	-	79	456	56	-	
Expenditure	(587)	(133)	(193)	-	(134)	(1,047)	(92)	(31)	
Gains on investment assets	-	101	-	-	-	101	1,227	416	
Transfers	109	44	-	-	-	153	(109)	(45)	
Balance at 31 December 2020	-	1,482	19	30	77	1,608	17,395	6,151	
Income	122	51	262	-	63	498	62	-	
Expenditure	(820)	(121)	(266)	-	(49)	(1,256)	(221)	(78)	
Gains on investment assets	-	71	-	-	-	71	1,025	365	
Transfers	698	(1,062)	-	-	-	(364)	(698)	1,617	
Balance at 31 December 2021	-	421	15	30	91	557	17,563	8,055	

#### Charity - movement in funds

		Restricted income funds			Endowmen	t funds		
	Chemists' Community Fund	Trust and lecture funds	Grant income	Total restricted income funds	Chemists' Community Fund	Trust and lecture funds	Total endowment funds	Total restricted funds
	£000£	£000£	£000	£000	£000	£000	£000	£000£
Balance at 1 January 2020	342	1,413	28	1,783	16,313	5,811	22,124	23,907
Income	136	57	184	377	56	-	56	433
Expenditure	(587)	(133)	(193)	(913)	(92)	(31)	(123)	(1,036)
Gains on investment assets	-	101	-	101	1,227	416	1,643	1,744
Transfers	109	44	-	153	(109)	(45)	(154)	(1)
Balance at 31 December 2020	-	1,482	19	1,501	17,395	6,151	23,546	25,047
Income	122	51	262	435	62	-	62	497
Expenditure	(820)	(121)	(266)	(1,207)	(221)	(78)	(299)	(1,506)
Gains on investment assets	-	71	-	71	1,025	365	1,390	1,461
Transfers	698	(1,062)	-	(364)	(698)	1,617	919	555
Balance at 31 December 2021	-	421	15	436	17,563	8,055	25,618	26,054

As required by the Statement of Recommended Practice, investment income attributable to endowments cannot be added to endowment capital and instead the income is allocated to restricted income funds. Endowment related expenses, with the exception of investment management fees, are charged to restricted income funds.

### **Chemists' Community Fund (CCF)**

Note 27 to these financial statements provides a memorandum account disclosing the Chemists' Community Fund income and expenditure for the year ended 31 December 2021.

#### Trust and lecture funds

Note 28 to these financial statements provides a breakdown of trust and lecture funds.

#### Transfers

Transfers from expendable endowment funds to restricted income funds take place to match the expenditure funded from expendable endownments. The transfer of £698k out of the CCF endowment funds to the CCF restricted income fund was required to meet expenditure incurred within restricted income. A £34k transfer out of expendable endowment trust funds to restricted income trust funds was also required to meet expenditure incurred within restricted income.

Transfers from general funds to restricted income trust funds takes place where expenditure incurred is in excess of income generated and brought forward available funds. £Nil was transferred into restricted income trust funds from general funds in 2021.

In October 2021, the Board of Trustees passed a resolution to consolidate a number of trust funds with varying fund classifications spread across designated funds, restricted income funds, expendable and permanent endowments. The balance of the transfers shown here, and in notes 26 and 28 are the result of consolidation process which resulted in a net transfer of £1,617k to trust fund endowment funds.

Refer to note 26 and note 28 for more detail on transfers between funds.

Total	Total
endowment funds	restricted funds
£000	£000
22,124	24,069
56	512
(123)	(1,170)
1,643	1,744
(154)	(1)
23,546	25,154
62	560
(299)	(1,555)
1,390	1,461
919	555
25,618	26,175

## 26. Unrestricted funds

#### Group and Charity

Movement in unrestricted funds					
	General funds	Funds held within	Designated	Pension	
	(free reserves)	non-charitable activities	funds	reserve	Total
	£000	£000	£000£	£000	£000
Balance at 1 January 2020	46,618	2,343	49,380	(29,827)	68,514
Income	58,580	5,232	474	-	64,286
Expenditure	(54,563)	(5,388)	(2,551)	(615)	(63,117)
Gains on investment assets	5,138	-	1,628	-	6,766
Transfers	(18,206)	-	16,283	1,924	1
Actuarial loss	-	-	-	(11,470)	(11,470)
Balance at 31 December 2020	37,567	2,187	65,214	(39,988)	64,980
Income	57,711	4,989	415	-	63,115
Expenditure	(54,360)	(4,389)	(3,611)	(547)	(62,907)
Gains on investment assets	3,912	-	1,249		5,161
Transfers	(6,820)	-	4,341	1,924	(555)
Actuarial gain	-	-	-	11,455	11,455
Balance at 31 December 2021	38,010	2,787	67,608	(27,156)	81,249

#### **Pension reserve**

The RSC operates a defined benefit scheme in the UK.

Refer to note 12 of these financial statements for more detail.

#### Group and Charity

	Balance at 1 January 2020	Income	Expenditure	Gains on investment assets	Transfers	Balance at 31 December 2020	Income	Expenditure	Gains on investment assets	Transfers	Balance at 31 December 2021
	£000£	£000	£000£	£000£	£000	£000£	£000£	£000	£000	£000	£000
Fixed assets reserve	-	-	-	-	5,760	5,760	-	-	-	(783)	4,977
Pension scheme recovery fund	-	-	-	-	9,000	9,000	-	-	-	-	9,000
Strategic alignment reserve	-	-	-	-	3,000	3,000	-	(61)	-	5,000	7,939
Strategic initiatives fund	16,057	-	(1,004)	-	(3,035)	12,018	1	(763)	-	(200)	11,056
New ventures fund	5,000	-	(16)	-	(2,500)	2,484	-	(23)	-	2,700	5,161
Fechnology roadmap Fund	3,286	-	(735)	-	4,300	6,851	-	(2,126)	-	(2,000)	2,725
Pension long term strategy fund	16,180	133	(104)	1,282	-	17,491	121	(219)	992	-	18,385
TGH repairs fund	1,100	-	-	-	-	1,100	-	-	-	-	1,100
Earmarked funds	629	4	(68)	-	(565)	-	-	-	-		
Member networks	2,021	295	(522)	-	285	2,079	221	(334)	-	161	2,127
Trust and lecture funds	5,107	42	(102)	346	38	5,431	72	(85)	257	(537)	5,138
Total	49,380	474	(2,551)	1,628	16,283	65,214	415	(3,611)	1,249	4,341	67,608

#### Fixed assets reserve

The Fixed asset reserve mirrors the current balance held in fixed assets. Fixed assets represent a portion of the free reserves which are locked and not readily available and historically have been deducted from general funds when calculating the free reserves number. Transferring the tangible assets and intangible assets net book value to this separate designated fund improves transparency of the amount of spendable funds on the face of the balance sheet.

#### Pension scheme recovery fund

The Pension scheme recovery fund ensures we can meet our remaining contractual commitments in the Recovery Plan.

#### Strategic alignment reserve

The Strategic alignment reserve will enable strategy implementation, realignment of our priorities and implement our cost efficiencies programme.

#### Strategic initiatives fund

The fund will be used to deliver impactful charitable activities over the next five to ten years and to enable the delivery of the RSC's Strategy by funding the non-recurring costs of major projects without having to afford this from day-to-day operating budgets.

#### New ventures fund

Previously referred to as the commercial strategy fund, this fund will enable investment into new income generating activities, including commercial acquisitions, over the duration of the Commercial Strategy (until 2025).

#### Technology roadmap fund

The fund comprises four strategic programmes which have been developed to support the RSC strategic objectives over the next 4 years (up to 2025).

#### Pension long term strategy fund

A capital sum of £15m was earmarked in 2018 to facilitate a buyout transaction of £30m in 2032, which will provide a permanent resolution to the deficit and fully discharge the RSC's employer obligations to the defined benefit pension fund.

## **TGH repairs fund**

Future capital repairs planned on the Thomas Graham House (TGH) building over the next five to ten years will be funded from this designated fund.

## Member networks

Each Member network has, as its objectives, those that are embodied in the RSC's Charter. There is no time frame for usage of the funds. The groups can use the funds as needed for their ongoing activities.

## Trust and lecture funds

Note 28 to these financial statements provides a breakdown of trust and lecture funds. There is no time frame for usage of the funds.

## Transfers

Transfers between funds arise when there is a charge from unrestricted general funds to other funds or releases from designated funds back to general funds.

The £1,924k transfer from general funds to the pension reserve (2020: £1,924k) reflects the employer defined benefit recovery plan contributions paid in the year. The £161k transfer from general funds to designated funds (2020: £285k) reflects the grants made by the RSC to Member networks to support activities at the level.

A transfer of £5,500k was made from the general fund to cover activities within the Strategic alignment reserve and the New ventures fund with additional funds being reclassified from the Strategic initiatives fund and the Technology roadmap fund. These transfers were approved by the Trustees in July 2021.

Furthermore a net transfer of £554k was made from the designated trust and lecture funds to the new RSC Recognition Fund held in endowment funds (see Note 28 for further details).

Transfers from general funds to designated trust funds takes place where expenditure incurred is in excess of income generated and brought forward available funds. £17k was transferred into designated trust funds from general funds in 2021.

## 27. Chemists' Community Fund Memorandum Account

The RSC Chemists' Community Fund was established to provide financial relief of its Beneficiaries, and insofar as the income is not required for such relief, to carry out such other legally charitable purpose as the RSC shall in its absolute discretion think fit. The Chemists' Community Fund operates within a well defined strategy to provide a flexible range of financial and non-financial help to members and their dependants to relieve poverty. We have a network of volunteers, predominantly in the UK. Some are actively involved in visiting existing or potential beneficiaries to help them with the application process. Others provide peer support, and are a local point of contact for isolated members of our community.

This memorandum account discloses the Chemists' Community Fund income and expenditure for the year ended 31 December 2021.

		2021			2020	
in	Restricted ncome funds	Expendable endowment funds	Total	Restricted income funds	Expendable endowment funds	Tota
	£000£	£000	£000	£000£	£000	£00
Income						
Casual Donations	-	2	2	-	18	1
Legacies and Bequests	-	60	60	-	38	3
Investment Income	122	-	122	136	-	13
Total income	122	62	184	136	56	19
Expenditure						
Grants Awarded	(443)	-	(443)	(324)	-	(324
Investment & Banking Fees	-	(221)	(221)	-	(92)	(92
Staff Costs	(338)	-	(338)	(235)	-	(235
Volunteer and Member expenses	(6)	-	(6)	(11)	-	(11
Other	(33)	-	(33)	(17)	-	(17
Total expenditure	(820)	(221)	(1,041)	(587)	(92)	(679
Net (expenditure)/income before investment gains	(698)	(159)	(857)	(451)	(36)	(487
Gains on investment assets	-	1,025	1,025	-	1,227	1,22
Net (expenditure)/income	(698)	866	168	(451)	1,191	74
Transfer between funds	698	(698)	-	109	(109)	
Net movement in funds increase/(decrease)	-	168	168	(342)	1,082	74
Reconciliation of funds						
Fund balances brought forward	-	17,395	17,395	342	16,313	16,65
Fund balances carried forward	-	17,563	17,563	-	17,395	17,39

## 28. Trust and lecture funds

Trust and lecture funds with either an opening or closing cumulative balance over £100k are disclosed in the table below together with the movements that have taken place

Fund Balances as at 31 December 2021

Fund Balances as at 31 December 2021				2021					
	2021 Opening balance £000	Donations £000	Income £000	Expenditure £000	Accumulated investment movement £000	Transfers £000	2021 Closing balance £000	202 Closin balanc	
	£000	£000	£000	£000	£000	£000	£000	£000	
Designated funds									
Research Fund	1,456	35	8	(12)	72	-	1,559	1,45	
Saville Fund	152	-	1	(2)	7	-	158	15	
Ludwig Mond Trust	106	-	1	(5)	4	(106)	-	10	
Industrial Division Endowment Lecture Fund	158	-	1	(2)	6	(163)	-	15	
A Spinks Symposia Fund	147	-	1	(2)	7	-	153	14	
Marriot Legacy	240	-	1	(3)	12	-	250	24	
W A Waters	265	-	2	(3)	13	-	277	26	
Colman-Porter Fund	411	-	2	(5)	20	-	428	41	
Memorial Fund	136	-	1	(2)	7	-	142	13	
Sir Derek Barton Fund	1,832	-	10	(18)	86	-	1,910	1,83	
E Frankland Fellowship	101	-	1	(2)	4	(104)	-	10	
C Sulzbacher	107	-	1	(1)	5	-	112	10	
Other designated trust funds	320	-	7	(28)	14	(164)	149	32	
Total	5,431	35	37	(85)	257	(537)	5,138	5,43	
Restricted income									
Tilden Lecture Fund	120	-	1	(17)	6	(110)	-	12	
A Robertson Bequest	254	-	2	(3)	14	-	267	25	
A Albert	721	-	4	(18)	32	(739)	-	72	
P Meares Legacy	104	-	1	(2)	5	(108)	-	10	
Other restricted income trust funds	283	-	43	(81)	14	(105)	154	28	
Total	1,482	-	51	(121)	71	(1,062)	421	1,48	
Expendable endowment									
William Briggs Fund	233	-	-	(3)	13	-	243	23	
R A Robinson Memorial Fund	220	-	-	(2)	10	(228)	_	22	
J O Cutter	833	-	-	(11)	47	(21)	848	83	
Charles Rees Award	126	-	-	(2)	7	-	131	12	
Recognition Fund	-	-	-	(6)	29	2,346	2,369		
Other expendable endowment trust funds	398	-	-	(4)	19	(331)	82	39	
Total	1,810	-	-	(28)	125	1,766	3,673	1,81	
Permanent endowment									
Centenary Fund	598	_		(7)	27	(618)		59	
Corday Morgan Medal and Prize Fund	239	-	-	(7)	11	(818)		23	
Corday Morgan Memorial Fund	239 938	-	-	(3)	42	(247)		23	
Robert Robinson Lecture Fund	146	-	-	(10)	42	(151)	_	14	
W J Hickinbottom Bequest	1,976	-	-	(1)	86	(2,044)	-	1,97	
Sir Derek Barton Award Fund	276	-	-	(13)	16		289	27	
Recognition Fund	-	-	-	(7)	45	4,055	4,093		
Other permanent endowment trust funds	168	-	-	(1)	7	(174)	-	16	
Total	4,341	-	-	(50)	240	(149)	4,382	4,34	
Total trust funds	13,064	35	88	(284)	693	18	13,614	13,06	
Totat dust fullus	13,064	30	00	(284)	695	10	13,014	13,06	

during 2021. All other trust and lecture funds that fall below the  $\pm$ 100k threshold have been grouped together for each fund type.

## **Recognition Fund**

During 2021 the RSC established a new RSC Recognition Fund as a special trust with the charitable purpose to advance the science of chemistry and its application for the public benefit by recognising excellence through the provision of awards, prizes and other means. 31 existing trust funds that had been created following donations, bequests and designations over the last century were identified as having a purpose aligned to the Recognition Fund, or had the potential to be realigned following consultation with donors and descendants. Following Trustee approval, and subsequent Charity Commission approval, the RSC Recognition Fund was created by the transfer of the 2021 Opening Balances and in year transactions from the identified trust funds. The Permanent Endowment Recognition Fund received £4,055k and the Expendable Endowment Recognition Fund received £2,346k.

### A Albert

The fund was founded in 1962 by a bequest from Adrien Albert. The fund gives financial support to lecturers and prizes likely to promote interest in the study of the laws connecting chemical structure with biological activity. This fund was consolidated into the Recognition Fund in 2021.

### W A Waters Bequest

The fund was founded in 1986 following a bequest of a 12.5% share of the residuary estate of the late William Alexander Waters to the RSC.

### Sir Derek Barton Fund and Award Fund

The fund was founded in 2000 following a bequest by Sir Derek Barton and is held for the advancement of public education in the field of chemistry and to award a prize for organic chemistry together with an annual dinner.

## **Centenary Fund**

In July 1947 the Chemical Society and subsequently the RSC celebrated the centenary of its foundation, which was commemorated by the creation of a capital fund. The fund is administered by the Council of the Society and the interest earned on the capital investment is employed to further the objectives of the RSC, such as the promotion of international interchange of new chemical knowledge. This fund was consolidated into the Recognition Fund in 2021.

### **Corday Morgan Memorial Fund**

The fund was founded in 1940 following a bequest by Sir Gilbert Morgan. The funds are to be applied for the unification of the chemical professions formerly within the British Empire by grants or other awards to the Chemical Council or to any other representative body of British chemists in such a manner as the Chemical Society, subsequently the RSC, may in their absolute and uncontrolled discretion determine. This fund was consolidated into the Recognition Fund in 2021.

### **Colman-Porter Fund**

The fund was founded in 1999 following a bequest from Mrs I V Colman–Porter for the purpose of helping needy but able post-graduate chemistry students. The capital is invested and the interest used to provide bursaries to students to allow their attendance at courses peripheral to their research but essential to their understanding of the world of business and current practices in industry.

## A Robertson Bequest

The fund was founded in 1975 for the promotion of teaching and study of chemistry at secondary school level..

## J O Cutter

The fund was founded in 1987 following a bequest by John Cutter. The income from the bequest is to establish and maintain a scholarship at a university approved by the RSC.

## **Hickinbottom Fund**

The fund was founded in 1979 and incorporates the William Briggs Scholarship. The income from the funds are used to endow a prize for notable contributions to the practices of organic chemistry. This fund was consolidated into the Recognition Fund in 2021.

## **Research Fund**

The fund has been established to promote original research in the science of chemistry. The fund is administered by the RSC and is awarded by the Research Fund Committee, which is authorised to make a limited number of awards in any one year.

## 29. Post balance sheet events

The financial statements were authorised for issue on 28 April 2022. Events taking place after this date are not reflected in the financial statements or notes. Where events taking place before this date provided information about conditions existing at 31 December 2021, the figures in the financial statements and notes have been adjusted in all material respects to reflect the impact of this information.

There were no adjusted post balance sheet events for the 2021 financial statements.

## 30. Connected charities

#### Sir George Beilby memorial fund

#### Accumulated fund

Represented by:

Investments RSC creditor

## Total

This fund is jointly administered by the RSC, the Society of Chemical Industry, and the Institute of Materials, Minerals and Mining. The RSC's share of the above figures are not Where events taking place before this date did not relate to conditions at the balance sheet date but provided information that is relevant to an understanding of the Group's financial position, these events are disclosed as part of this note.

There were no non-adjusted post balance sheet events to disclose.

2021	2020
£000£	£000
77	58
92	73
(15)	(15)
(20)	(13)
77	58

included in the Statement of Financial Activities, Charity's Balance Sheet or Consolidated Balance Sheet on the basis of materiality.

## 31. Transactions with Trustees and related parties

### **Trustees' Royalty Payments**

No Trustee received a royalty payment relating to contributions made to RSC publications during the 2021 year (2020: £nil).

#### **Trustees' Remuneration**

No Trustees received or waived remuneration for their role as a trustee during the 2021 year (2020: £nil).

#### **Trustees' Expenses**

The total amount of expenses reimbursed to 5 (2020: 6) Trustees or paid directly to third parties in respect of travel to meetings and related expenses in 2021 was £2k (2020: £5.8k).

### **Donations from Trustees**

Total donations received without conditions from trustees was £nil in 2021 (2020: £100).

#### **Trustees' Indemnity Insurance**

The amount paid in 2021 for Trustees' Indemnity Insurance was £14,572 (2020: £13,475).

#### **Related Parties**

The following transactions took place between the Charity and its subsidiaries:

	2021	2020
	£000	£000
Service payments to RSC Worldwide Limited	(4,683)	(4,827)
Gift aid received from RSC Worldwide Limited	513	690
Gift aid received from Chemistry Limited	-	267
Debtor amounts due from subsidiaries		
Chemistry Limited	237	218
RSC Worldwide (US) Inc	509	504
Friends of the RSC, Inc.	13	13
RSC Worldwide Limited	552	3
RSC Worldwide Germany GmbH	3	3
Creditor amounts due to subsidiaries		
RSC Worldwide Limited	(1,579)	(12)
Royal Society of Chemistry Japan K.K.	(8)	(9)
Chemistry Limited	(6)	(5)

There have been no other related party transactions in 2021.

#### Guarantees

The RSC operates a group registration for Value Added Tax (VAT) purposes, including the Charity, Chemistry Limited and RSC Worldwide Limited. Each entity within the VAT group is jointly and severally liable for any UK VAT liabilities present within the Group. The VAT liabilities as at 31 December 2021 in respect of RSC Worldwide Limited and Chemistry Limited were £1.5k (2020: £1.8k) and £2.7k (2020: £0.7k) respectively.

## 32. Accounting policies

### Accounting convention

The Royal Society of Chemistry (RSC) is a company established by Royal Charter and limited by guarantee, and domiciled in England and Wales, registration number RC000524. The principal office is Burlington House, Piccadilly, London, W1J 0BA.

The financial statements have been prepared in accordance with Accounting and Reporting by Charities: Statement of Recommended Practice applicable to charities preparing their accounts in accordance with the Financial Reporting Standard applicable in the UK and Republic of Ireland (FRS 102) (effective 1 January 2015), Charities: Statement of Recommended Practice (FRS 102), the Financial Reporting Standard applicable in the UK and Republic of Ireland (FRS 102), and the Charities Act 2011.

The financial statements have been prepared to give a 'true and fair' view and have departed from the Charities (Accounts and Reports) Regulations 2008 only to the extent required to provide a 'true and fair view'. This departure has involved following Accounting and Reporting by Charities preparing their accounts in accordance with the Financial Reporting Standard applicable in the UK and Republic of Ireland (FRS 102) issued on 16 July 2014 rather than the Accounting and Reporting by Charities: Statement of Recommended Practice effective from 1 April 2005 which has since been withdrawn.

The Royal Society of Chemistry meets the definition of a public benefit entity under FRS 102.

#### **Going concern**

The going concern basis of accounting is considered to be appropriate because there are no material uncertainties related to events or conditions that may cast significant doubt about the ability of the RSC to continue as a going concern. In arriving at this conclusion, the RSC has performed financial modeling and taken account of current and anticipated financial performance, liquidity, its reserves position and the ability to draw down on readily realisable investments as required in light of the impacts experienced and expected of the COVID-19 crisis and downturn of the global economy. For these reasons, the going concern basis continues to be adopted in the preparation of the RSC's financial statements.

#### **Basis of consolidation**

The consolidated statement of financial activities (SoFA) and the consolidated balance sheet include the financial statements of the charity and its subsidiaries consolidated on a line by line basis. Intra-group transactions and profits are eliminated fully on consolidation. Accounting policies are consistent across the group.

Chemistry Limited and RSC Worldwide Limited are wholly owned subsidiaries of the RSC.

RSC Worldwide (US), RSC (Beijing) Chemical and Science Technology Consulting Co. Ltd., Royal Chemistry India Private Limited, Royal Society of Chemistry Japan K.K. and RSC Worldwide (Germany) GmbH are wholly owned subsidiaries of RSC Worldwide Limited.

Royal Chemistry India Foundation is a wholly owned subsidiary of Royal Chemistry India Private Limited. Both companies have a reporting date of 31 March.

Friends of the RSC, Inc. is registered in the US and receives donations to support the RSC's wider charitable objectives. As a Section 501(c)(3) corporation, it is not a wholly owned subsidiary but all of the members and controlling officers are employees of the RSC group operating under the direction of the RSC and therefore the company has been included in the consolidated financial statements. The company has a reporting date of 30 November.

The local sections, regions and interest groups and Chemists' Community Fund are separately constituted by Trust Deeds. Their results and net assets are accounted as branches in these Financial Statements.

## **General funds**

The General funds mainly represent undesignated monies earned from publishing activities. They also comprise financial or other gifts bequeathed in a Will without any restriction upon their use, or stated as being for 'general use'. The funds are managed in accordance with the RSC's reserves policy.

## **Designated funds**

Designated funds are unrestricted funds which have been internally 'ring fenced' for a specific use/purpose. The purpose of these funds can be varied by internal resolution.

The member network designated funds relate to the large number of member led groups which allow the wider community to connect with fellow chemists based on either geographical location or subject interest. The geographical network consists of 35 local sections in the UK and Ireland and 23 sections based outside the UK. Regions and interest groups are subject specific covering the breadth of the chemical sciences research, education, innovation and policy. The groups are run by members and organise annual programmes of events, award portfolios and bursaries. The income within the designated funds is taken and held directly by the Interest Groups and used solely for the purposes of that group. As such it is classified as designated fund income and not recognised as general fund income.

### **Restricted funds**

Restricted income funds can comprise grants restricted to specific projects, or a financial or other gift bequeathed in a Will or Trust Deed with a specific direction as to use.

An expendable endowment fund allows both the capital and income of the fund to be applied in accordance with specific conditions. Income generated from expendable endowment is spent in accordance with any restriction within a reasonable time of receipt. Capital is held in perpetuity unless expended at the discretion of Trustees.

A permanent endowment fund requires the permanent investment of the capital of the fund, with only the income being applied in accordance with any conditions.

The RSC's restricted funds are the Chemists' Community Fund, various trust funds, restricted grants, Royal Chemistry India Foundation and Friends of the RSC, Inc.

The Chemists' Community Fund provides financial and nonfinancial assistance to the RSC's members, past members, their partners and dependents. The Chemists' Community Fund holds contracts that allow it to nominate occupation of 15 units of sheltered housing. In accordance with FRS 102, the value is held as zero as these rights have no realisable value.

Various trust funds are restricted to specific aspects of the RSC's activities. The income of the various trust funds finances lectureships, awards, prizes, and research grants.

The restricted grants are restricted to specific projects by the donors that further the RSC's charitable activities. Income is recognised when the RSC is entitled to the grant, which is usually when the grant is received, except for performance related grants: income for these is recognised when a specified output is achieved.

Royal Chemistry India Foundation is a charitable foundation, registered in Delhi, India. Its primary purpose is to deliver educational programmes in chemistry within India, including teacher training and student outreach camps.

Friends of the RSC, Inc. is a US private foundation which was incorporated to offer a tax efficient way for US citizens to make donations to support scientific research and projects at educational institutions in the United Kingdom.

#### **Income recognition**

Income is measured at the fair value of the consideration received or receivable. The fair value of the consideration received or receivable takes into account the amount of any trade discounts, prompt settlement discounts and volume rebates. Income is shown net of Value Added Tax.

### Voluntary income, including donations and legacies

Voluntary income, including donations and legacies, is recognised in the SoFA when any conditions for receipt have been met and when the entitlement is probable and measurable.

#### Trading income

Trading income relates to income generated by noncharitable subsidaries. Profit from trading subsidiary undertakings is transferred to the Charity under the gift aid scheme and included as investment income in the RSC's own accounts.

#### Investment income

Investment income is recognised on an accruals basis and apportioned between funds on the basis of the level of funds invested. Investment income is reinvested into the investment portfolio and not withdrawn to defray operating expenditure.

#### **Deferred Income**

Income received in the year or invoiced in advance for journal and membership subscriptions relating to future years is shown as deferred income in the balance sheet. The income is treated as income in the year the subscription covers.

Conference income received in advance is deferred and treated as income in the year the respective conference is held.

#### Membership

Membership subscription income is treated as income in the year the subscription covers. Any receipts in respect of future years are shown as deferred income on the balance sheet. Life membership subscriptions are accounted for on a received basis. In 2021 these subscriptions amounted to £4k relating to 8 members (2010: £11.5k, 16 members).

### **Conference income**

Income for conferences is recognised in the year of the event.

#### **Publishing income**

Income from publishing activities, including Chemistry World, is recognised in two separate ways, dependent on the specific product:

- Income for the sales of institutional subscriptions, package subscriptions and consortium deals, is recognised in equal monthly proportions during the subscription year.
- Income for the sales of journal archive and eBooks is recognised when access to the product is passed to the customer.

#### **Government grants**

Income from government and other grants, whether 'capital' grants or 'income' grants, is recognised when the charity has entitlement to the funds, any performance conditions attached to the grants have been met, it is probable that the income will be received and the amount can be measured reliably and is not deferred.

#### Intangible income

No value has been placed on the support given to the RSC by way of volunteer assistance. The RSC has not received any other intangible income or gifts in kind.

#### Expenditure

All expenditure is accounted for on an accruals basis and has been classified under headings that aggregate all costs related to the category. Where costs cannot be directly attributed to a particular heading they have been allocated to activities on a basis consistent with the use of resource. Governance costs include expenditure on compliance with constitutional and statutory requirements.

Costs of raising funds include investment management fees and corporate fundraising costs. Fundraising costs include the salaries and overheads of the staff who directly undertake fundraising activities plus allocated support costs.

#### **Staff Costs**

The costs of short-term employee benefits are recognised as a liability and an expense.

Employees are entitled to carry forward up to 10 days of any unused holiday entitlement at the reporting date. The cost of any unused entitlement is recognised in the period in which the employee's services are received.

The best estimate of the expenditure required to settle an obligation for termination benefits is recognised immediately as an expense when the RSC is demonstrably committed to terminate the employment of an employee or to provide termination benefits.

#### Apportionment of support costs

Support costs are those which provide indirect support to front-line activites. Support costs not attributable to a single activity have been apportioned on the basis of head count for each of the respective departments. Refer to note 9 for details.

#### Grants

Grants made by RSC in relation to the Chemists' Community Fund are treated as expenditure as soon as they are approved by the Benevolent Fund Grants Committee as there is an expectation of receipt by the Beneficiary. Other grants made from designated funds represent grants made to local sections, divisions and interest groups, which are treated on a cash payment basis.

## Leases

Rentals under operating leases are charged to the SoFA on a straight-line basis over the lease term allocated to the charitable activities to which they relate.

## Taxation

The RSC is registered as a charity (Charity Commission reference 207890) and as such the income arising from and expended on its charitable activities is exempt from corporation tax. It is also registered for Value Added Tax with HM Revenue and Customs and is subject to partial exemption rules. Any irrecoverable VAT is either included in fixed asset costs or in support costs that are then allocated to the charitable activities as applicable.

## Foreign currency

Monetary assets and liabilities in foreign currencies are translated into sterling at the rate of exchange ruling at the balance sheet date. Transactions in foreign currencies are translated into sterling at the rate of exchange ruling at the date of transaction or at an exchange rate that approximates the actual rate. Exchange differences are taken into account in arriving at the operating result.

Forward exchange contracts are used to manage the exposure to foreign exchange rate risks related to US dollar income and cash balances.

The balance sheet values of subsidiaries have been translated at the closing rate on 31 December 2021. The profit and loss transactions have been translated at the rate of exchange ruling at the date of transaction or at an exchange rate that approximates the actual rate.

## Intangible fixed assets

Intangible assets are capitalised at cost, including any directly attributable costs. These are currently amortised on a straight-line basis over a five year period, which is the useful economic life of the asset. A full impairment review is carried out in the year of acquisition with consideration given in subsequent years to whether any indicator of impairment exists.

Amortisation of the index and databases are charged to publishing activities.

## Tangible fixed assets and depreciation

Items of a capital nature are capitialised at cost if their individual purchase price is valued at £10k or above. For groups of items that cumulatively exceed £10k the previous point still applies, as the categorisation will be based on the unit price. The only exception to this is where individual components are integral to a main asset coming into use. Purchased software is capitialised at cost. Depreciation is provided on all tangible fixed assets, at rates calculated to write off the cost or valuation of each asset to its estimated residual value on a straight line basis over its expected useful life, as follows:

#### Leasehold land and buildings:

Thomas Graham House	2%				
Burlington House	5%				
Fixtures, fittings and equipm	ent:				
Computer software	20%-33%				
Personal computers	25%				
Other computer hardware	20%				
Other fixtures and fittings	2%-25%				

Fixed Assets are written down to their realisable value if it is considered that there has been a permanent diminution in their value. Assets are reviewed annually for impairment.

#### Investments

Quoted investments are stated at market value, using quoted bid price, at the balance sheet date. Account is therefore taken of both realised and unrealised gains in the SoFA. Investment income is stated on an accruals basis.

## Investment in subsidiary undertakings

Investments in subsidiary undertakings are stated at cost, but are written down to their realisable value if it is considered that there has been a permanent diminution in their value.

## Heritage assets

The RSC does not capitalise its heritage assets as neither reliable cost information nor comprehensive valuations are readily available and such information cannot be obtained at a cost commensurate with the benefit to the users of the accounts and to the Charity. The RSC was founded in 1841 and the library collection has been built over time to contain a large number of unique and irreplaceable historical items. Therefore due to the number of books held and the lack of comparable market values these assets have not been recognised on the balance sheet as any value attributed to these assets would be purely subjective and of limited practical use.

## **Recognition of liabilities**

Liabilities are recognised when an obligation arises to transfer economic benefit as a result of past transactions or events.

### **Derivative instruments**

The RSC uses forward foreign currency contracts and forward options to reduce exposure to foreign exchange rates. Forward options involve buying a contract which would give the RSC the right but, unlike forward foreign currency contracts, not the obligation to exchange foreign currency for GBP at a pre-agreed rate on a specified date. Forward option premiums are expensed to the SoFA. Derivative financial instruments are initially measured at fair value on the date the derivative contract is entered into and are subsequently re-measured to fair value at each reporting date. Fair value gains and losses are recognised in the SoFA.

## Pensions

The RSC has two types of pension scheme:

## Defined contribution plan

The RSC operates a defined contribution scheme. The RSC's contributions are charged to the SoFA's general funds and restricted income funds during the period in which the employee is an active member of the scheme. The cost of administering the scheme and providing for death in service are met by the RSC.

## Defined benefit plan

The RSC operates a defined benefit pension scheme. The defined benefit plan closed to new entrants on 31 December 2002 and was closed to future accrual on 30 November 2011.

The pension liability recognised in the balance sheet is the obligation of the RSC, being the present value of its defined benefit obligation at the reporting date minus the fair value at the reporting date of plan assets out of which the obligations are to be settled.

The pension costs for the scheme are recognised as follows: (i) the change in the net defined benefit liability arising from employee service rendered during the reporting period in the SoFA; (ii) net interest on the net defined benefit liability during the reporting period in the SoFA; (iii) the cost of plan introductions benefit changes, curtailments and settlements in the SoFA; (iv) remeasurement of the net defined benefit liability in other recognised gains or losses on the SoFA. The net interest element is determined by multiplying the net defined benefit liability by the discount rate, at the start of the period taking into account any changes in the net defined benefit liability during the period as a result of contribution and benefit payments. The net interest is recognised in the SoFA as other income or apportioned in expenditure. Remeasurement of the net defined benefit liability comprises: (i) actuarial gains and losses; and (ii) the return on plan assets, excluding amounts included in net interest on the net defined benefit liability. Remeasurement of the net defined benefit liability recognised in other gains or losses on the SoFA shall not be reclassified to profit or loss in a subsequent period.

### **Financial assets and liabilities**

The RSC has elected to apply the provisions of Section 11 'Basic Financial Instruments' and Section 12 'Other Financial Instruments Issues' of FRS 102, in full, to all of its financial instruments.

Financial assets and financial liabilities are recognised when the RSC becomes a party to the contractual provisions of the instrument, and are offset only when the RSC currently has a legally enforceable right to set off the recognised amounts and intends either to settle on a net basis, or to realise the asset and settle the liability simultaneously.

Fixed asset investments and forward exchange contracts are measured at fair value through the SoFA. All other financial instruments are measured at amortised cost.

### **Cash and cash equivalents**

Cash at bank and cash in hand includes cash and short term highly liquid investments with a short maturity of three months or less from the date of acquisition or opening of the deposit or similar account.

## Key judgements and assumptions

The cost of the defined benefit pension plan has been determined by updating the results of the 31 December 2019 full actuarial valuation to 31 December 2020. This was carried out by a qualified actuary independent of the RSC. The actuarial valuation involves making assumptions about discount rates, mortality rates and future pension increases. Due to the complexity of the valuation, the underlying assumptions and the long term nature of the scheme, such estimates are subject to significant uncertainty. In determining the appropriate discount rate, the management considers the market yields of AA corporate bonds consistent with the currency and term of the defined benefit obligation. The mortality rate is based on publicly available mortality tables, which uses data for UK self-administered pension schemes and allowing for expected future improvements in longevity. Future salary increases and pension increases are based on expected future inflation rates as determined by the Bank of England spot rate with a consistent term of the defined benefit obligation at the valuation date.

Further details are given in Note 12.

## 33. Consolidated statement of financial activities for the year ended 31 December 2020

The prior year consolidated statement of financial activities is shown below:

		Unrestricted funds				Restricted funds					
-	General funds	Designated funds	Total general and designated funds	Pension reserve	Total unrestricted funds		Restricted income funds	Endowment funds	Total restricted funds		
	2020	2020	2020	2020	2020		2020	2020	2020		
	£000	£000£	£000	£000	£000		£000	£000	£000		
Income and endowments from:											
Donations and legacies	18	32	50	-	50		78	56	134		
Other trading activities	124	-	124	-	124		-	-	-		
Investment income	527	169	696	-	696		194	-	194		
Charitable activities											
Membership	4,071	17	4,088	-	4,088		-	-	-		
Chemistry World	868	-	868	-	868		-		-		
Scientific conferences and events	77	252	329	-	329		52	-	52		
Education and professional practice	143	-	143	-	143		132	-	132		
Publishing	57,889	-	57,889	-	57,889		-	-	-		
Advocacy and awareness	39	4	43	-	43		-	-	-		
Other income	56	-	56	-	56		-	-	-		
Total income and endowments	63,812	474	64,286	-	64,286		456	56	512		
Expenditure on:											
Raising funds											
Donations and legacies	292	92	384	4	388		-		-		
Other trading activities	221	-	221	-	221		-	-	-		
Investment management costs	365	130	495	-	495		7	123	130		
Charitable activities											
Membership	3,746	1,104	4,850	55	4,905		713	-	713		
Chemistry World	2,575	37	2,612	24	2,636		-		-		
Scientific conferences and events	1,152	25	1,177	16	1,193		52	-	52		
Education and professional practice	5,861	226	6,087	72	6,159		274	-	274		
Publishing	38,275	637	38,912	369	39,281		1		1		
Advocacy and awareness	7,464	300	7,764	75	7,839		-	-	-		
Total expenditure	59,951	2,551	62,502	615	63,117		1,047	123	1,170		
Net income/(expenditure) before investment gains/(losses)	3,861	(2,077)	1,784	(615)	1,169		(591)	(67)	(658)		
Gains/(losses) on investment assets	5,138	1,628	6,766	-	6,766		101	1,643	1,744		
Net income/(expenditure)	8,999	(449)	8,550	(615)	7,935		(490)	1,576	1,086		
Transfer between funds	(18,206)	16,283	(1,923)	1,924	1		153	(154)	(1)		
Net group (expenditure)/income before other recognised gains and losses	(9,207)	15,834	6,627	1,309	7,936		(337)	1,422	1,085		
Remeasurement on defined benefit pension scheme	-	-	-	(11,470)	(11,470)		-	-	-	(	
Net movement in funds (decrease)/increase	(9,207)	15,834	6,627	(10,161)	(3,534)		(337)	1,422	1,085		
Reconciliation of funds											
Fund balances brought forward	48,961	49,380	98,341	(29,827)	68,514		1,945	22,124	24,069		
Fund balances carried forward	39,754	65,214	104,968	(39,988)	64,980		1,608	23,546	25,154		
				(00,000)							

Total 2020 £000
184 124 890
4,088 868 381 275 57,889 43 56
64,798
388 221 625
5,618 2,636 1,245 6,433 39,282 7,839
64,287
511
8,510 9,021
9,021
(11,470)
(2,449)
92,583 90,134



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