News story: PM statement following meeting with Prime Minister al-Abadi of Iraq

Prime Minister, thank you for welcoming me to Baghdad today.

And let me pay tribute to the bravery and sacrifice of the Iraqi security forces. They are on the front-line in the fight against terrorism and extremism.

And I am proud of the role the UK has played to support Iraq in this endeavour as part of the Global Coalition against Daesh.

That's why I was so pleased to meet British troops at Taji earlier today.

We will continue to stand by Iraq as the last remnants of Daesh's so-called Caliphate are liberated.

For as long as the Iraqis want and need it, the UK will continue to be a fully committed security partner.

We will support you to 'win the peace' — addressing the issues that led to Daesh's rise, and building a stronger, more inclusive and unified Iraqi state.

We will continue to support the training of your security forces and invest a further £10 million over the next three years in strengthening Iraqi counterterrorism capabilities.

And we will work with partners across the region to develop the capabilities that will enable us to deal with the threat posed by foreign fighters fleeing as Daesh is squeezed out of its physical caliphate.

The UK has already provided over £200 million since 2014 to support the humanitarian response in Iraq. And I am pleased to announce today that we will provide at least £20 million in new humanitarian assistance next year. This will support Iraqis who have suffered under Daesh and help to provide access to water, food, and healthcare.

And we will provide up to £30 million to support stabilisation, reconciliation and reform in Iraq. This will help to provide a safe environment for all Iraqis, as well as promoting longer-term peace and security.

We will continue to support your government as it seeks to deliver the reforms needed to rebuild public trust in a unified, independent and sovereign Iraqi state.

As I said in our meeting just now, we encourage the Iraqi government to

respond positively to the new Kurdish leadership, and we encourage the Kurdish Regional Government to respect the Iraqi Federal Supreme Court ruling on the unconstitutionality of their referendum.

And I welcome the discussion we have just had with reference to the discussions between the government and the Kurdish Regional Government.

We call on both sides to now move quickly to negotiations of outstanding differences on the basis of the constitution.

So Prime Minister; thank you for our talks today. I look forward to the relationship between our two great countries continuing to go from strength to strength.

Press release: UK ramps up counterterror effort in Iraq as Daesh caliphate crumbles

On 29 November 2017 the Prime Minister became the first major foreign leader to visit Iraq since the fall of Mosul, announcing the UK's commitment to addressing the evolving threat from Daesh and countering the dispersal of foreign fighters as Daesh is squeezed out of the battlefield in Syria and Iraq.

Speaking to British troops in Iraq, the Prime Minister said that our military success against Daesh means they are increasingly losing control of their territory and resources, but in response to our military success, Daesh has become more diffuse, organic and networked.

So the Prime Minister has committed to three specific things to counter the evolving Daesh threat and to manage the risk of foreign fighters returning to Europe:

- First, we will deepen our counter-terrorism relationship with Iraq. The UK will invest £10m over the next three years to build Iraq's counter-terrorism capability to meet the new threat. This means more personnel working with Government of Iraq counter-terrorism agencies. And it means deploying law enforcement resources to develop effective judicial pathways. This will allow us to spot and respond to terrorist threats against Iraq and ourselves, in partnership with Iraqi security forces.
- Second, we will work with partners across the region to develop border infrastructure, watch-lists and biometric capabilities, to counter

foreign fighter dispersal. This will help ensure foreign fighters are identified, stopped, and disrupted before they can harm people, and so we can manage the return of women and children.

• Third, we will do more to tackle terrorist abuse of the internet. The Prime Minister has advocated, most recently at the UN General Assembly with President Macron, Prime Minister Gentiloni and 70 other countries, for the major communications companies to live up to their responsibility, and remove content within one to two hours of release. The companies have begun to act: they have set up the industry led Global Internet Forum to Counter Terrorism but they need to go further and faster in identifying and removing content and ultimately preventing it from going up in the first place.

The Prime Minister has also announced today that the UK will continue to support Iraqi defence and security through the provision of officer training, including places for Iraqi students on high profile UK courses at the Military Colleges and the Defence Academy, and UK training teams continuing to develop Iraqi trainers, supporting them in the delivery of courses on topics such as Counter-Improvised Explosive Devices, combat medicine, military planning, logistics, and force protection.

The Prime Minister visited British, Coalition and Iraqi troops at Taji earlier today and congratulated them on the success of the counter Daesh campaign. Around 80 British troops are based at Taji, and the Prime Minister had the opportunity to see them alongside their Coalition counterparts, training the Iraqi security forces.

Speaking in Iraq, the Prime Minister said:

Daesh's ability to spread propaganda at speed drew terrorists to Iraq and Syria from around the world, contributing to the death of many thousands of innocent people and the destruction of Iraqi infrastructure.

Military success against Daesh means they are increasingly losing control of the territory, resources and population that allowed them to be a uniquely dangerous threat to Iraq, the region and Europe.

But we have always expected that the threat Daesh posed would evolve. In response to our military success, Daesh has become more diffuse, organic and networked. The UK is committed not only to defeating Daesh militarily but also to countering the dispersal of foreign fighters from Iraq and Syria.

News story: Future electric vehicle batteries: long-lasting, cleaner, better

New projects by UK businesses and researchers will tackle some of the biggest challenges preventing the uptake of electric vehicles in the UK.

A total of 27 projects involving 66 organisations will share around £40 million to support the design, development and manufacture of batteries for the electrification of vehicles.

The grant funding comes from Innovate UK under the Industrial Strategy Challenge Fund.

Improved battery management

A major barrier in electric vehicle adoption is their lifespan and range.

Current electric vehicle batteries aren't as good as their combustion engine counterparts and degrade quickly. Drivers are also unsure of their vehicle's ability to cover certain distances due to charge levels and limited charge infrastructure.

Clean-tech start-up Brill Power will lead a consortium to address this.

Faraday Battery Challenge. ISCF winners. Brill Powers

Christoph Birkl, CEO, Brill Power, said:

We have to improve batteries, we have to make sure we can get more energy into every battery, we have to make sure we can get them as efficient as possible, get every joule of energy out of those batteries to make them live as long as the cars live.

Working with $\underline{\text{E-Car}}$, it will explore how its battery management control system can be used to enhance the battery manufacture and performance of electric vehicles.

Christoph continued:

At Brill Power we've developed battery control and management technology that can make lithium-ion batteries live for up to 60% longer.

We do that by individually managing every cell in a battery pack without having to replace the entire battery. We can just replace

Reuse, remanufacture, recycle

As the number of electric vehicles grows, we also need to consider how we deal with batteries once they come to the end of their life and can no longer be used in the initial automotive application.

<u>HSSMI</u>, an independent institute specialising in the application of digital techniques within manufacturing, is the lead of one project addressing this issue, which involves multiple businesses and <u>UCL</u> (University College London).

Faraday Battery Challenge. ISCF winners. HSSMI

Paul Shearing, Reader in Chemical Engineering & Materials, UCL, said:

When a battery is beginning to reach its end of life in an automotive application — perhaps when it falls down to about 80% of its original rated capacity — it still has a huge amount of value for a second life type of application.

Caroline Guest, Manager of Electric Powertrains and Circular Value Chains, HSSMI, added:

You can combine it with things like solar power and wind. It's also being looked at for rail and marine applications as back up batteries as well.

The project will look at taking end-of-life, automotive lithium-ion batteries, and either reusing, remanufacturing or recycling them. It will build a complete supply chain network and legal and regulatory knowledge in the UK.

In doing so, the project will help to optimise battery design and increase use in second-life applications, improve recyclability and whole-life environmental impact, while building UK capabilities.

Other projects

The projects being lead by Brill Power and HSSMI are just 2 that will receive government investment.

Others to get funding under this competition aim to:

• create a safe, economically sustainable battery recycling supply chain in the UK, which allows industrial batteries from vehicles to be recycled into base components and materials and then reused. <u>Johnson</u>

Matthey is the lead

- build the UK as a hub for battery cell manufacture. The lead is <u>AGM</u>
 Batteries
- develop battery modules and packs for a range of vehicles, including supercars, buses and diggers. <u>Delta Motorsport</u> is the lead
- develop a new battery storage system for heavy-duty vehicles. The lead is <u>Perkins Engines</u>

A Brill Power battery pack.

Co-ordinated programme of investments

Business and Energy Secretary, Greg Clark, announced the investment in innovation projects at <u>Battery and Energy Storage 2017</u>.

Also in the announcement was the UK's first automotive battery manufacturing development facility, which will be built from an £80 million investment through the <u>Advanced Propulsion Centre</u>.

Leading the development are the <u>Coventry and Warwickshire Local Enterprise</u>

<u>Partnership</u> with <u>Warwick Manufacturing Group</u> (WMG). The facility will allow
the UK to develop new processes to manufacture pioneering battery technology
at high-volume, giving us a competitive advantage.

It follows on from last month's Industrial Strategy Challenge Fund announcement of the multi-million-pound Faraday research institution. This institution will accelerate fundamental research and development of battery technologies. It is being funded through the Engineering and Physical Sciences Research Council (EPSRC).

The Faraday Battery Challenge

Government's Industrial Strategy Challenge Fund is bringing together UK research organisations with businesses to tackle the biggest industrial and societal challenges we are facing.

The Faraday Battery Challenge is one strand within the fund. This is a £246 million investment by government over 4 years. It aims to develop safe, cost effective, durable, lighter weight, high-performing and recyclable batteries in the UK to power the next generation of electric vehicles.

Ultimately, these innovations should help grow UK businesses and make the nation a world leader in battery technology.

Apply for funding

For businesses and researchers with ideas to support the electric vehicle batteries of the future, the next funding opportunity will open in January 2018.

Press release: Man jailed for sexual assault on young boy

A man who sexually assaulted a young boy has been imprisoned after his non-custodial sentence was overturned by the Court of Appeal.

Nicholas Henshall, 44, was found guilty of sexual assault on a child at Liverpool Crown Court in September this year.

He initially received a 20 month sentence suspended for 2 years, and a 10 year Sexual Harm Prevention Order. His sentence was referred to the Court of Appeal by the Solicitor General Robert Buckland QC MP under the Unduly Lenient Sentence scheme.

At a hearing held today, the Court quashed the original sentence and replaced it with 20 months imprisonment without suspension, less 28 days credit for time spent on qualifying curfew. The 10 year Sexual Harm Prevention Order is still in place. Henshall has been ordered to surrender himself by tomorrow, 30 November, to begin his sentence.

Following the hearing, the Solicitor General said:

"Nicholas Henshall committed a horrible crime on a vulnerable young boy who showed immense courage in reporting the offending. The original sentence did not reflect the seriousness of this offence and I welcome today's ruling from the Court of Appeal that he will now be imprisoned."

Press release: Government investment into Faraday scale-up facility to make UK a world leader in battery innovation

- Greg Clark confirms details of £120 million of government's flagship Faraday Battery Challenge investment into making the UK a world leader in the development and production of battery technology
- £80 million set to be invested in a new state-of-the-art automotive battery development facility, the UK's first ever facility of this kind, based in West Midlands, following a successful bid by a consortium led

by Coventry and Warwickshire LEP and including Warwick Manufacturing Group

- Government will shortly publish details of its Automotive Sector Deal agreement reached with industry, with a strategic vision that builds on the collaborative partnership established between government and the auto sector
- Business Secretary also confirms £53 million of funding for new aerospace projects boosting the West Midlands strength in this sector

Business and Energy Secretary Greg Clark has today (Wednesday 29 November) announced that Coventry and Warwickshire will be the home of the new National Battery Manufacturing Development Facility (NMDF).

The facility, with £80 million of funding from the government's flagship £246 million investment in battery technology — the Faraday Battery Challenge — will be the UK's first ever battery development facility and will help establish the UK as one of the world leader's in battery technology and innovation.

A key part of the Automotive Sector Deal, the new centre will build on the West Midlands exceptional reputation for automotive expertise and research and development (R&D) with a facility that will host cutting-edge production and assembly processes and support the future scale-up of battery technologies.

The facility will be responsible for turning the most promising early and mid-stage battery research and development activities into scalable business propositions that are commercially viable, while also providing a learning environment to enable training and skills development. The new centre will be an independent facility that is openly accessible to UK-based companies wishing to develop battery technologies.

In a speech to the <u>Battery and Energy Storage Conference</u>, Greg Clark confirmed that the area had won the national competition, led by the Advanced Propulsion Centre (APC), for the new centre, following a successful bid by a consortium led by Coventry and Warwickshire LEP and including Warwick Manufacturing Group. The open competition was overseen by APC and judged by an independent panel.

Business and Energy Secretary, Greg Clark said:

Battery technology is one of the most game-changing forms of energy innovation and it is one of the cornerstones of our ambition, through the Industrial Strategy and the Faraday Challenge, to ensure that the UK leads the world, and reaps the economic benefits, in the global transition to a low carbon economy.

The new facility, based in Coventry and Warwickshire, will propel the UK forward in this thriving area, bringing together the best minds from academia and industry together to deliver innovation and R&D that will further enhance the West Midlands international reputation as a cluster of automotive excellence.

Dr Ralf Speth, CEO Jaguar Land Rover, said

If the UK wants to stay competitive and make domestic EV manufacturing viable in the long run, a high level of ambition is required as set out in the Industrial Strategy. JLR is already investing heavily to make the vision of autonomous and electric mobility come true.

From 2020, all of our new vehicles will be electrified with Mild Hybrid, Plug-in Hybrid and Battery Electric solutions, and these are already being designed in the West Midlands. We also intend to produce battery electric vehicles in the region, bringing the West Midlands to the forefront of modern mobility in the UK.

Lord Bhattacharyya, Chairman of Warwick Manufacturing Group, said

WMG, at the University of Warwick, has a strong record of industry innovation partnerships going back many years. We are delighted that we will be home to the National Battery Manufacturing Development Facility, a core part of the Faraday Battery Challenge.

This will be an openly accessible centre of real impact, working coherently with the application-inspired fundamental research emerging from Faraday Institution and ensuring the transfer of technology takes place at scale to support the industrialisation of batteries in the UK.

This joined up end-to-end approach will be a UK first, and is critical to ensure our fundamental research translates into sustaining and growing manufacturing jobs in the UK.

Faraday Challenge winners

During his speech the Business Secretary also announced the winners of £40 million of additional Faraday Battery Challenge investment, allocated through Innovate UK led Industrial Strategy Challenge Fund innovation competitions, that will help make UK businesses a world leader in battery technology.

27 innovative projects are being funded, involving 66 organisations, covering key technologies such as the development of battery materials and cell manufacturing, design and production of modules and packs including advances in thermal management and battery management systems, and recycling and recyclability of battery packs.

Innovate UK Chief Executive, Ruth McKernan said:

The Faraday Battery Challenge is breaking new ground because it offers for the first time a co-ordinated programme of competitions across research, innovation and scale-up.

It will therefore draw the very best of the UK's world-leading research into commercial technologies and put UK businesses at the forefront of electric vehicle battery development.

Aerospace R&D funding

Following the launch of the Industrial Strategy White Paper, Business Secretary Greg Clark has also today announced £53.7 million of funding for 7 R&D projects to grow innovation in the aerospace sector. This funding is part of government's work with industry through the Aerospace Growth Partnership (AGP) to tackle barriers to growth, boost exports and grow high value jobs.

Today's announcement builds on the £923 million of government investment delivered through the ATI programme, which has supported 196 projects involving 208 different companies and organisations. Establishing the Institute in 2013, government and industry made a joint commitment to invest £3.9 billion in civil aerospace R&D projects by 2026.

Two of these projects, Digital Reconfigurable Additive Manufacturing facilities for Aerospace (DRAMA) and the Open Flight Deck project, led by GE Aviation, will directly benefit the Midlands. A further project — the Zephyr Innovation Programme (ZIP) led by Airbus — will develop aerospace battery technology amongst other areas.

Business Secretary Greg Clark said:

Earlier this week, we launched our ambitious Industrial Strategy which builds on our significant economic strengths, while looking at innovative ways to improve our productivity and will ensure government continues to work closely with industries including our UK aerospace sector.

The UK aerospace sector is one of the most successful in the world, which is why we are today announcing £53.7 million of investment in 7 aerospace research and development (R&D) projects across the UK. This investment, part of the £3.9 billion government and industry committed to this sector by 2026. The Aerospace Technology Institute plays a crucial role in helping to direct this investment and maintain UK excellence in the sector.

Notes to editors

Additional quotes:

Simon Saunders, CEO, Ariel Motor Company, said:

We face significant challenges when looking to progress our vehicle technologies toward low and zero emission platforms, with our combination of specialist niche requirements not currently being met by the existing UK supply chain. Therefore, we are particularly interested in the proposed centre of excellence and the planned capability to support such a broad range of manufacturing requirements.

Chief Executive of the Advanced Propulsion Centre, Ian Constance said:

The new National Battery Manufacturing Development facility will be a national asset and the first of its kind open to all UK-located organisations. It will enable them to develop manufacturing processes for their concept-ready battery technologies at production rates appropriate to 'giga' factories.

The objective is that these processes can transfer to UK high-volume manufacturing facilities.

Jonathan Browning, chair of the Coventry and Warwickshire Local Enterprise Partnership, said:

This is excellent news on every level. We have worked very closely with our partners WMG and Coventry City Council with support from the West Midlands mayor and that joined-up approach not only maximised our effectiveness but sent a powerful message to Government.

We believe we are uniquely placed with our links between industry and academia to bring the National Battery Manufacturing Development Facility to fruition and it will give huge opportunities to local companies of all sizes and will continue our push to be world leader in advanced research and manufacturing, especially in the automotive and transport sector.

It will also further enhance our reputation as the Knowledge Capital of the UK in the field of engineering R&D.

Coventry City Councillor Jim O'Boyle, cabinet member for jobs and regeneration and CWLEP board director, said:

Its brilliant news that Government has decided the country's new National Battery Manufacturing Development Facility should be located here.

I'm glad the final decision has been made and of course I'm delighted that my home city will once again be at the cutting-edge

of the automotive sector. For many years our city and region provided the innovation and skilled workforce to help the UK lead the world.

Car manufacturing provided a secure, well paid job for thousands of Coventry people, including me. And now battery development has the potential to do the same for a whole new generation of Coventry people.

I hope battery development will create thousands of new jobs and if there is one thing we know for certain, it's that having a job changes lives. That's the real reason this is such good news. And Coventry of course is the it's the perfect choice. We have a rich heritage in motor vehicle manufacture and it's only right that we will once again lead the way with this pioneering new technology.

Clean air vehicles and autonomous cars are the future and now the centre of excellence will be here right where it belongs. It's the public sector, industry and education working together that has got us to this point today but now it's time for the real work to begin.

Projects linked to the Midlands include:

The Open Flight Deck project, led by GE Aviation, will seek to overcome the barriers to adopting new technologies on the flight deck; traditionally difficult to do because of the high cost of change and certification. Open Flight Deck will be an open platform that allows the OEM to work with a range of suppliers to develop 'apps' — easier to build, quicker to deploy, and with the potential for upgrade as new capabilities become possible. The consortium behind the project, which has received a grant of £13.1 million, also includes BAE Systems, Rolls-Royce, Coventry University and the University of Southampton.

The DRAMA (Digital Reconfigurable Additive Manufacturing facilities for Aerospace) project is led by the Manufacturing Technology Centre (MTC) with partners ATS Global, Autodesk, Granta Design, Midlands Aerospace Alliance, National Physics Laboratory, Renishaw and the University of Birmingham. DRAMA will establish leading additive manufacturing 'test bed' facilities for the aerospace industry and its supply chain at the National Centre for Additive Manufacturing (based at the MTC in Coventry) and the Renishaw AM Solution Centre in Stone. The project will showcase the use of digital technologies to drive productivity and reliability in AM, leading to increased adoption of AM technologies by the aerospace sector and, in the long term, other industrial sectors. It will also deliver the world's first digitally-twinned reconfigurable AM facility and establish the UK as a global leader in additive manufacturing technology. The project, part of the ATI programme, has received a grant of £11.2 million through the Industrial Strategy Challenge Fund.

Project developing aerospace battery technology

The Zephyr Innovation Programme (ZIP) was created as a strategic R&D project to develop new cutting-edge component technologies to support Airbus's Zephyr High Altitude Pseudo Satellite (HAPS). ZIP is led by Airbus in partnership with Axillium Research, Formtech Composites, Productiv, OXIS Energy, Newcastle University and Cranfield University. The grant of £3.6 million will support the development of key technologies in aerostructures, battery technology and energy storage, and propulsion that will enable flight performance improvements, expanding the operational capabilities of the next generation of Airbus Zephyr.