South West Wales Corporate Joint Committee - Energy Sub-Committee

(Via Microsoft Teams)

Members Present: **6 November 2023**

Chairperson:	**Councillor D.Simpson**
Councillors:	T.Hodgeson, A.Owen, A.Lewis and W.F.Griffiths
National Park Representatives:	S.Alderman and L.Bickerton
Officers In Attendance:	S.Brennan, G.Bacon, A.Moss, S.Keating, R.Griffiths, A.Eynon, W.Bramble, S.Aldred-Jones, G.Jones, L.McAndrew, B.Burggraaf, V.Camp and J.Baker-Edwards and C.Plowman

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1. **Welcome and Chairs Announcements**

The Chairperson welcomed everyone to the meeting.

2. **Declarations of Interests**

The following declaration of interest was received:

Liz Bickerton	General declaration - As she is a freelance consultant, who undertakes a number of evaluations for third sector organisations, some involving energy efficiency. Energy efficiency is one of the priorities of the Energy Sub Committee.

3. **Terms of Reference**

The Committee were presented with the Terms of Reference of the

Energy Sub Committee of the South West Wales Corporate Joint Committee.

It was explained that the Terms of Reference were presented to the Corporate Joint Committee, along with the other Sub Committee Terms of Reference, in October 2022.

Members were informed that the document set out the overarching aim of the Sub Committee; along with the functions and makeup of the Committee.

RESOLVED: That Members note the terms of reference of the Energy Sub-Committee.

4. **South West Wales Regional Energy Policy and Scene Setting**

Members received a presentation setting the scene on factors and governance structures influencing regional energy policy, and outlining known developments in regional energy.

A discussion took place in regards to planning for a more integrated, low carbon energy system. It was explained that the National Policy, Regional Energy Strategies and Local Area Energy Plans (LAEPs) were integral to achieving this.

The circulated presentation highlighted the landscape within the South West Wales Region, giving a broad picture of the governance and level of detail for the various work streams; for example, there were a number of Regional Officer Task Groups taking place, and progress was underway in terms of the key projects for the Region, including the Celtic Freeport and Blue Eden – Tidal Lagoon Project.

Members were informed that the current situation was fairly similar across other Regions in Wales, in terms of their governance structures.

It was stated that the South West Wales Corporate Joint Committee had approved its Corporate Plan, which included the action plan for the Regional Energy Strategy; there were two priorities included in this plan, which the Regional Directors Group had been working on progressing. The first priority noted was to map avaliable resources and identify resource gaps; one of the impact measures of this was to establish a Regional Delivery Team. It was confirmed that job adverts for the three posts within the Team had been advertised, and interviews would be taking place in the next few weeks; the three

positions were for a Project Manager and two Project Officers, all of which would be funded by Welsh Government. It was explained that the implementation and delivery work would accelerate from this point onwards.

Following on from the above, it was noted that the second priority was to formulate implementation programmes alongside partners; some of the actions within this priority was to develop prioritised action plans, and align with the LAEPs. It was confirmed that this work had been ongoing, and again this work will progress further when the Regional Delivery Team was in place.

The Committee were informed of the challenges associated with this work stream:

- Pace and scale at the regional strategic level
- Uncertainty around the cost of delivery/net zero
- Funding capital and revenue for identified projects
- Skills work to design, deliver, implement, maintain and monitor
- Policy reforms and influence
- Governance
- Infrastructure

It was reiterated that one of the priority actions was to align projects; one of the identified projects was an investment prospectus for the Region, which would align the Celtic Freeport, LAEPs, regional planning and other key projects taking place across the Region. Members were informed that Officers were hoping to develop an investment prospectus in partnership with Net Zero Industry Wales.

The Chief Executive from Net Zero Industry Wales was in attendance at the Energy Sub Committee to provide further information in regards to the future proposal for an investment prospectus for the Region. It was explained that the Net Zero Industry Wales was set up with support from Welsh Government, in order to assist the Welsh industrial clusters in their efforts to decarbonise; over the last six months there had been focus on supporting the industrial clusters in South Wales to deliver their plans. Following discussions with Pembrokeshire Council, it was noted that it was clear there was a need to update the investment prospectus for the area; in order to help attract inward investment, and to highlight the advantages of the investment plans that had been developed and how they could benefit the Region, including the Celtic Freeport.

The Committee was informed that there were several Clean Growth Hubs within the South Wales industrial cluster; the Milford Haven Future Energy Cluster being one of them, however they were also in other areas such as Port Talbot, Cardiff and Newport. It was noted that it would be important for each Hub to capture the inward investment potentials, and detail how that cluster will develop over time.

Reference was made to the support Net Zero Industry Wales was receiving from PwC, and how they would be looking into recruiting staff to assist with the work required to progressing this work.

It was concluded that the intention of Net Zero Industry Wales was to establish a team approach, and alignment of the various elements of work, as opposed to reinventing what was already in existence.

Members asked if Net Zero Industry Wales planned to align the work with privately funded projects, such as the Blue Eden –Tidal Lagoon Project, which weren't funded by the Government. The Committee was assured that this was the intention, with the support of the private companies.

Prior to the continuation of the presentation, it was explained that the Transport Team within the Welsh Government Energy Service had completed some analysis on the fleet transition across all Local Authorities. Officers were pleased to confirm that the South West Region was leading across Wales; the average of fleet transition was around 4%, and the South West were leading with 7.2%.

Officers provided information in regards to the regional economy and energy landscape; the importance of understanding the landscape, the scale of opportunity and gaps. It was detailed in the presentation that Milford Haven was the UK's largest Energy Port; however, surrounding this was Valero Pembroke Refinery and Oil Terminal which was the second largest in Europe, RWE Pembroke Power Station which was the second biggest combined cycle gas power station in Europe, LNG Terminals at South Hook and Dragon, and Puma with their commodity storage facility. In terms of offshore, it was highlighted that there was huge potential in the Celtic Sea for marine renewables; whether this be floating offshore wind or tidal wave power.

It was evident that the South West region had vast emitters, with the UKs largest single point emitter at TATA Steelworks in Port Talbot, RWE being the third biggest emitter in the UK, and Valero being in

the top ten single point emitters in the UK; it was a significant opportunity to support this transition to low carbon methods of energy production and use.

A discussion took place in regards to the South Wales Industrial Cluster project and its vision to 'develop a world leading, truly sustainable industrial cluster, befitting the societal needs of 2030, 2040, 2050 and beyond'. It was explained that decarbonisation can happen through various means such as fuel switch from gas and oil into renewable electricity, electric arc furnaces in the steel industry, and electrolysing to make green hydrogen using renewable electricity; there were some great benefits of this including retention of jobs, and unlocking further opportunities in the new renewable economy.

Members were informed of one of the developments called HyLine Cymru; this would be a dedicated hydrogen pipeline which would flow from the West, where the floating offline wind industry was set to establish. It was explained that there should be an abundance of renewable electricity from this; there were times where the renewable electricity wouldn't feed into the electricity grid, and during this time it would be best to make hydrogen with that renewable electricity. Officers stated that hydrogen was a versatile fuel that can be used where and when it was needed; a pipeline into that industrial cluster was really key to enabling the hydrogen industry, and also enabling floating offshore wind in the Celtic Sea. It was added that the power produced from the turbines could be used day and night.

A further discussion took place in regards to floating offshore wind. It was stated that The Crown Estate's (TCE's) ambition was to unlock up to 4.5GW of new floating offshore wind capacity by 2035; with regional potential to utilise a further 20GW of floating offshore wind capacity by 2045. Officers mentioned that studies had shown there was even more capacity out there, potentially attainable between 49.9GW to 120GW. The presentation detailed that there were 3,000 jobs and £682million in supply chain opportunities for Wales and Cornwall by 2030; and made reference to the three projects that were currently underway:

- TwinHub developed by Hexicon with expected contracted completion by 2025
- Erebus developed by Blue Gem Wind with expected completion by 2026/2027

- Valorous developed by Blue Gem Wind with expected completion by 2029

Officers provided a graphic of where the initial consenting zones were going to be with TCE for floating offshore wind; the three zones were highlighted, each having 1.5GW to add up to the 4.5GW capacity by 2035. It was explained that it would then be key to get that power ashore in a coordinated fashion; and as previously mentioned, hydrogen could potentially be made out at sea and come ashore in pipelines.

Members made reference to the fact that TCE was a UK Government business, and asked for clarity in terms of how money for licences would flow back to Wales. It was noted that currently those funds would go to the UK Government; however, there was a recommendation from the National Infrastructure Commission to identify if it could be devolved, similarly to how the Scottish Crown Estate had been devolved. It was added that the benefits for Wales was the consent to build renewables in Welsh waters, which would also create the supply chain benefits.

Reference was made to the recent news in regards to the transition to electric at TATA Steelworks in Port Talbot, and the implications for those steel making jobs. It was noted that electric arc furnaces would require less man power; however, there had been £1.2billion reserved for Port Talbot which was one of the biggest investments seen for the industry in decades. It was added that the electric arc furnaces were a stepping stone towards a green steel industry, and there would be more opportunities from this. Officers mentioned that the £1.2billion was in addition to multiple other billions of investment required to decarbonise the industry in South Wales, and retain some of that industrial activity; in the short to medium term, there was potential job growth in order to deliver this ambitions plan across the region.

A discussion took place in regards to the opportunities associated with tidal stream, tidal range and wave; and the various projects that were currently ongoing. It was mentioned that one of the benefits of tidal stream and tidal range was that they were predicable power sources.

The presentation detailed information in regards to the Swansea Port Development Project (formerly known as the Blue Eden –Tidal Lagoon Project); this was a £4billion project, estimated to be worth

£114m a year to the Swansea economy, and creating up to 2,500 full-time jobs. Officers expanded on the various elements to the project, which included:

- Expanding the Fabian Way park and ride site to create a green energy transport hub to potentially include a hydrogen manufacturing station for hydrogen-powered transport, an abundance of electric vehicle charging points, and restaurants and flexible working areas for visitors to enjoy.
- Expanding on approved solar farm plans at the former Tir John landfill site to create one of the UK's largest solar energy generating facilities.
- A new manufacturing facility on the former Morrissey Site in SA1 to make high-tech batteries that would store the renewable energy generated by the project and for worldwide distribution.
- A tidal lagoon
- A floating solar facility
- A hyper-scale data centre powered by renewable energy
- An oceanic and climate change research centre
- Energy-efficient eco-homes anchored in the water
- A new district heating system using renewable energy

In regards to transmitting renewable electricity, it was explained that currently the grid doesn't have the capacity to be able to transmit more than 1.8GW; last year the UK generated c.30% of its energy from renewables, of which wind power was the biggest contributor. It was further explained that when the wind farms were operating at night, and demand on the grid was low, there may be opportunities to store this power in batteries or to electrolyse green hydrogen which could be stored for future use for industry, power generation, transport or heat. It was explained that currently when wind turbines were generating at capacity, and generating more wind power than can be transmitted due to grid bottlenecks, this can lead to overloading of the grid; at which point the National Grid pays the windfarms to turn off, and pays for an alternative generator to be turned on, which would typically be gas powered near to the point of demand. Officers stated that last year, the UK spent £215million on turning wind farms off, and £717million turning on gas power plants to replace the lost wind power.

Following on from the above, Officers highlighted some of the potential solutions, one of those being to build more electricity cables to take the power to demand centres; this would mean there would be

more pylons, which aren't favoured throughout communities. Another solution mentioned was to add more energy storage at cable bottlenecks; for example, lithium batteries, pumped hydro and creating blue/green hydrogen.

Officers provided further information in regards to hydrogen production, which had great renewable electricity potential. It was explained that upgrades were needed in terms of the electricity grid and ports infrastructure; however, sufficient progress was being made, with the carbon content of the grid electricity dropping by 60-70% over the last ten years, a lot of development with the ports especially since the Celtic Freeport announcement. Members were informed that industrial processes, heat and transport emissions were the hardest sectors to action and lower emissions; there were still a lot of oil and gas being used in industry, as well as diesel and petrol being used for vehicles. However, it was noted that there was potential for green hydrogen to service industry, transport, power generation and heat; studies showed that increasing volumes of floating offshore wind would be a well suited and economic way to produce green hydrogen, and enable an increase in usable energy to provide heat and fuel for transport. It was mentioned that the forecast for the cost of producing green hydrogen from UK floating offshore wind would become very affordable, and by 2050 will be on a par in the UK with the lowest global price for green hydrogen production.

The Committee were provided with information in regards to the current projects that were underway across the Region:

- RWE Pembroke Net Zero Centre – £3billion had been announced for this project, which was looking at all aspects of green hydrogen production and how this hydrogen could be utilised.
- Swansea Bay City Deal Programme – included a number of projects that were aligned with the regional energy agenda; some of these included Pembroke Dock Marine project, Homes as Power Stations and Supporting Innovation and Low Carbon Growth Project.
- Global Centre of Rail Excellence – the UKs first net zero railway purpose built for research, testing and certification of rolling stock, infrastructure and innovative new rail technologies, with the aim to be fully operational by 2025.
- Celtic Freeport bid – the business case was currently being drafted for this project, with the requirement to submit to UK

Government by the end of the month; this project will transport the ports and had many benefits such as the potential of 16,000 jobs, £5.5billion of new investment and accelerating the roll out of floating offshore wind.

- Eirlys Solar Farm – a proposal for 29MW solar development in Port Talbot.
- Canolfan Eto – a circular economy hub in Carmarthenshire looking at recycling resources at their 're-use village'.

Members queried how hydrogen would be cascaded across the country. Officers confirmed that there was a project ongoing with the gas network companies called 'Project Union'; this would involve a hydrogen gas pipeline, connecting all industrial clusters across the county. It was mentioned that the HyLine Cymru would link in with this, running from the waterway in Milford Haven into the industrial cluster at Baglan, Port Talbot. Officers added that this could potentially be moved at whatever volume was required across the country, to satisfy the needs for industry, heat and transport.

It was expressed that collaboration was hugely important, and there was a need and desire to do this; there was some good collaborative work currently ongoing, however it was recognised that this could be expanded. One example provided of where collaboration was needed, was in regards to the charging and refuelling infrastructure. Officers stated that it was also key that the Corporate Joint Committee engage, on a regional basis, in terms of fleet transition.

In addition to the above, it was explained that there had recently been a collaborative procurement exercise for fleet across all of Wales; this had resulted in a saving of around £650,000, and seen delivery times go down around 18 months to between two/three months. It was mentioned that there will be another procurement exercise taking place in the near future, and Officers confirmed they would share further information on this when it becomes avaliable.

A discussion took place in regards to the need for the Energy Sub Committee and Corporate Joint Committee to determine how it was going to take this work forward. It was mentioned that further intelligence may need to be gathered before the Committees were able to make a decision on this.

RESOLVED: The report was noted.

5. **Local Area Energy Plan (LAEP) Progress Update**

The Principle Energy and Sustainability Consultant at City Science provided the Committee with an update in regards to the progress of delivery of the Local Area Energy Plans (LAEPs) within the Region.

It was explained that City Science was producing three LAEPs for South West Wales, in Carmarthenshire, Neath Port Talbot and Swansea; with Pembrokeshire already having their own LAEP. It was noted that although the plans were produced separately and tailored to the local area, it was recognised that there was a need for regional alignment; a lot of the activity being carried out by City Science was ensuring consistency across the Region.

Members were informed that Local Area Energy Planning was a comprehensive study into the local area energy system; looking at the whole system and all of the sectors involved, to determine the energy requirements between now and 2050, and what was needed to decarbonise the energy system during that time. It was added that the LAEP project started in February 2023, and was due to run until February 2024.

A discussion took place in regards to the Corporate Joint Committee and LAEP interaction. It was noted that the Corporate Joint Committee was the regional steering group for LAEP sign off, and also a key stakeholder; whilst the plans were local, they will be developed using regional collaboration. Whilst many of the scenarios were local, it was highlighted that a large number were regional; therefore, ensuring the LAEPs remained connected and transparent with regional governance structures was vital.

Following on from the above, it was explained that whilst the Corporate Joint Committee was not a governing body for LAEP progress, it was important to provide updates on the progress made. Officers confirmed that the individual Local Authorities will soon be receiving their draft LAEPs.

In addition, it was stated that once all LAEPs across Wales were completed, the Energy Systems Catapult, who were the organisation to develop the concept and guidelines for the LAEPs, were going to pull the information together to create regional and national views of Local Area Energy Planning; this would help to provide informed evidence base across Wales.

The presentation detailed information in regards to the various stages of developing a LAEP. It was mentioned that throughout the progress

of the LAEP, there was an extensive stakeholder engagement process to assist in the work.

- Stage 1 and 2 – preparation, project management and producing a stakeholder engagement plan
- Stage 3 - developing a baseline using local and national data to understand the local area energy systems
- Stage 4 – developing various data models for the local area energy systems, including model of future scenarios
- Stage 5 – refining scenarios and identifying pathway to net zero
- Stage 6 – developing and prioritising near and long-term actions to support the delivery of the pathway, as well as developing a robust action plan
- Stage 7 – delivery of the LAEP

It was explained that the LAEPs for Carmarthenshire, Neath Port Talbot and Swansea were currently at stage 6 of the process. Members were informed that various workshops had taken place during this stage, including Action Workshops and Prioritisation Workshops; Focus Groups were currently being held to build on the potential actions in a lot more detail.

City Science provided detail in regards to the extensive stakeholder engagement processes that had been undertaken thus far:

- During Stage 2 – held a Stakeholder Planning Workshop to conduct stakeholder mapping and develop the stakeholder engagement plan.
- During Stage 3 – held 1:1 interviews (10 per Local Authority) to provide baseline information; following this held a Stakeholder Baseline Review to share the developed baseline.
- During Stage 4 – held a Scenarios Workshop to explore potential future scenarios; following this held a Modelling Approach Meeting to refine and agree on the modelling approach.
- During Stage 5 – held a Wider Factors Workshop to understand the wider, non-technical factors in the area; following this provided a Model Outputs Presentation and Pathway Refinement Workshop.
- During Stage 6 – as previously mentioned, held an Actions Workshop and Project Prioritisation Meeting.

It was highlighted that the next steps will be to hold a Governance Workshop with the Local Authorities, and a separate Community Focus Group.

The Committee were provided with detail in regards to the different ways in which actions could be developed. The presentation highlighted an example from Pembrokeshire's LAEP, in which their actions were split into different categories e.g. electric grid reinforcement, deploy heat pumps and decarbonise transport; and another from Peterborough's LAEP which used quick wins, low regrets, enabling actions and decision points as part of their actions.

Following on from the above, it was explained that the actions for Carmarthenshire, Neath Port Talbot and Swansea had yet to be confirmed; however there was going to be 15 actions per Local Authority, and the presentation provided an idea of how these actions could be grouped.

The presentation also displayed an example of how the 'action detail' could be displayed for each of the final actions. It was mentioned that City Science had been refining this area of work over many years as a consultancy, and had found it was vital to provide extra detail; this would include an overview of the action, route map alignment, governance (both owners and champions of each action), implementation steps, funding requirements, cost benefit, and risk and dependencies.

To conclude the presentation, Members were informed of the next steps and current timeline for those steps:

- Action Focus Group – 23/8/2023
- Governance Workshops – 01/12/2023
- Finalise Actions – 07/12/2023
- Draft LAEP Delivery – 15/12/2023
- Feedback from Councils – 19/01/2024
- Delivery of Final LAEP – 09/02/2024

Members queried whether the work being carried out by City Science linked in with the Race to Zero campaign, and if the South West Wales Region would be signing up to this area of work. Officers explained that the Race to Zero campaign was a public facing way of demonstrating the progress being made towards targets. It was noted that arrangements could be made to provide the Committee with further information in regards to Race to Zero, at a future meeting,

which could enable the Committee to determine if they wish to take part in this.

A discussion took place in regards to the capital costs involved in producing and delivering the LAEPs. It was explained that it would be a collaborative effort across both public and private sectors to deliver the LAEPs; it would be important to have Welsh Government intervention and funding in order to deliver energy efficiency. It was added that Welsh Government were already supporting with grants for heat pumps, and in regards to the Electrical Vehicle roll out around 97% of that had been leveraged as grant funding to date.

Reference was made to the engagement activities that City Science were undertaking as part of the work for the LAEPs, and whether a community based approach had been considered as part of the activities. It was highlighted that wider stakeholders had been included across a lot of the engagement work, for example engaging with Small and Medium-sized Enterprises (SMEs) and large energy users to discuss how they could potentially reduce consumption. In terms of community groups, it was noted that they had been invited to the workshops that had taken place; there was also an upcoming focus group which was specifically going to look at how the community can be involved in certain actions.

Officers added that there had also been community engagement at Welsh Government level; the team within Welsh Government leading on Local Area Energy Planning were in communication with Community Energy Wales to discuss local area energy planning.

RESOLVED: The report was noted.

6. **Future Priorities and Forward Work Programme**

The Committee received the Forward Work Programme for the Energy Sub Committee.

A discussion took place in regards to the frequency of meetings. It was agreed that there was a need for an additional meetings of the Energy Sub Committee; Democratic Services would arrange this in liaison with the Energy Leads for the Region.

The following items were proposed to be added to the Forward Work Programme during the meeting:

- Regional Skills Partnership – Upskilling and Resources for the future

- Update from the Welsh Government Hydrogen Team
- Presentation on Race to Zero and Carbon Disclosure Project

The Forward Work Programme was noted.

7. **Urgent Items**

There were no urgent items received.

CHAIRPERSON