

TWC/2023/0714

Land off, Buildwas Bank (North of Silvertrees, Jiggers Bank), Coalbrookdale, Telford, Shropshire

Erection of a battery energy storage system including access track, CCTV and light poles, car parking spaces, perimeter fencing and gates, and associated infrastructure ***Amended Plans Received*** ***Amended Information Received: Drainage, Ecology and Noise***

APPLICANT

Lower Coalmoor BESS Ltd,

RECEIVED

22/09/2023

PARISH

Little Wenlock, Dawley Hamlets

WARD

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THIS APPLICATION HAS BEEN CALLED TO COMMITTEE AT THE REQUEST OF CLLR GARETH THOMAS.

<https://secure.telford.gov.uk/planning/pa-applicationssummary.aspx?applicationnumber=TWC/2023/0714>

1. SUMMARY RECOMMENDATIONS

- 1.1 It is recommended that **DELEGATED AUTHORITY** be granted to the Development Management Service Delivery Manager to **GRANT FULL PLANNING PERMISSION** subject to conditions and informatives.

2. SITE AND SURROUNDINGS

- 2.1 The site subject to this application comprises approximately 1.35 hectares of agricultural land at the western end of a field enclosed by hedges. The land is currently used for grazing. An Agricultural Land Classification survey has identified the land as subgrade 3b quality due to wetness and gradient limitations. The site has a notable gradient with the land falling away southwards to the River Severn.
- 2.2 The site is located adjacent to Jiggers Bank in Coalbrookdale, which is located 1.5km south-east of Little Wenlock, 1km west of Lightmoor and 2.5km north-west of Ironbridge.
- 2.3 The site is located adjacent to Lydebrook Dingle SSSI, including Ancient Woodland and Loamhole Dingle Local Geological Site which forms part of the Borough's Green Network.
- 2.4 The site is in proximity to the Severn Gorge Conservation Area, lying just over 0.5km to the south and the Ironbridge Gorge World Heritage Site, lying approximately 1km to the south. Horsehay and Spring Village Conservation Area is approximately 1km to the northeast.

2.5 The land is crossed by an overhead line, which would provide direct connection to the National Grid.

3. PROPOSAL

3.1 This application seeks full planning permission for construction and operation of a Battery Energy Storage System (BESS) together with all associated work, equipment and necessary infrastructure. The purpose of the BESS is to store excess energy to enable it to be used during times of peak demand, instead of wasted.

3.2 A new site access is proposed from the A4169, designated as a Principal Distributor on the Local Plan, within the vicinity of the existing site access. A new permeable access track would be constructed from the site access, allowing vehicles to access the enclosed development area via two internal access points.

3.3 The associated equipment shall comprise:

- 132/33 kV Switchyard;
- Battery Energy Storage Racks approx. 2.5m in height;
- SKID Solution (Inverter + Transformer) approx. 3.8m in height;
- Customer Switchroom approx. 3.5m in height;
- Customer Control Building approx. 3.6m in height;
- Customer Store Building approx. 2.6 in height;
- Auxiliary Transformer approx. 2.4m in height;
- DNO Metering Substation approx. 6.8m in height;
- DNO Control Building approx. 3.7m in height;
- DNO Store Building approx. 2.09m in height;
- Below ground attenuation tank with oil interceptor;
- 4 no. car parking spaces;
- Access track, perimeter fence and gate approx. 2.4m in height;
- Light poles, and CCTV Camera Column to be approx. 5m in height;
- Landscaping and biodiversity net gain, including tree, hedgerow and field margin planting, bird and bat boxes.

3.4 The CCTV cameras would be limited to look inwards within the perimeter of the fence within the site boundary. Landscaping mitigation is proposed around the site perimeter and within the site.

3.5 It is proposed to connect the BESS to the electricity network via the pylon located within the site. The BESS is proposed to be connected to the 132kV overhead line via a 132kV metered substation to be built within the site next to the point of connection.

- 3.6 The infrastructure is proposed to be operational for 40 years. According to the Planning Statement, at the end of its 40-year operational life, all above ground infrastructure would be decommissioned, removed and the land returned to its original condition as an open field. The Applicant states they have no intentions to extend the site with additional BESS or other renewable energy infrastructure.

4. PLANNING HISTORY

- 4.1 EIA/2022/0004 Land off Buildwas Bank (North of Silvertrees), Coalbrookdale – Screening Opinion for Environmental Impact Assessment (27.10.2022)

5. RELEVANT POLICY DOCUMENTS

- 5.1 National Planning Policy Framework (NPPF)
- 5.2 National Planning Practice Guidance (NPPG)
- 5.3 Telford and Wrekin Local Plan (2011-2031)
- SP3 Rural Area
 - SP4 Presumption in favour of sustainable development
 - NE1 Biodiversity and geodiversity
 - NE2 Trees hedgerows and woodlands
 - NE6 Green Network
 - C3 Implications of development on highways
 - C5 Design of parking
 - BE1 Design Criteria
 - BE3 Ironbridge Gorge World Heritage Site
 - BE5 Conservation Areas
 - BE9 Land stability
 - ER1 Renewable Energy
 - ER2 Mineral Safeguarding
 - ER11 Sewerage systems and water quality
 - ER12 Flood Risk Management

6. NEIGHBOUR REPRESENTATIONS

- 6.1 The application has been publicised through a site notice, press notice and direct neighbour notification. Two stages of consultation have taken place, the second further to an amended site layout and information submitted in respect of noise, ecology, drainage and land stability.
- 6.2 The Local Planning Authority received one neighbour representation

supporting the scheme on the basis of the first consultation, the following summarised issues were raised:

- Battery storage is good for the environment

6.3 The Local Planning Authority received 36no. neighbour representations (from 31no. addresses) objecting to the scheme on the basis of the first consultation, the following summarised issues were raised:

- Fire risk and ensuing pollution – run-off water from extinguishing fires might pollute the surrounding environment and/or reach the River Severn below the site or the Lydebrook
- Ecological importance of Lydebrook Dingle
- Air borne pollution arising from fires on-site/toxic fumes
- Insurers prefer batteries to be spaced 4.5m apart
- Lithium batteries are dangerous
- Poor location
- Poor access for emergency services
- Being built on built up land
- Noise disturbance
- Visual/aesthetic impact
- Increase in traffic
- Busy road
- Land instability
- Lighting provision will affect night-time wildlife
- Brownfield industrial sites in Telford would be more appropriate
- Landscaping proposals could be better
- Not enough information about BESS
- No publicity or engagement
- Natural beauty
- World Heritage Site and Outstanding Universal Value will be compromised
- Weight of materials
- Pylon
- Insufficient water capacity available on the site to extinguish fires.
- Could contaminate SSSI and River Severn
- Site does not meet NFCC guidelines (2023)
- Insufficient spacing between battery units
- Proposals conflict with Policy ER1 in the Local Plan
- Government has proposed battery storage facilities have a form of industrial/environmental permit

6.4 The Local Planning Authority received 6no. neighbour representations (from 6no. addresses) objecting to the scheme on the basis of the second

consultation, the following summarised issues were raised:

- Site is not suitable
- Landscape mitigation will take a long time to mature
- Impact upon visual amenity of Ironbridge Gorge
- Noise impacts
- Minimal change shown in amendments
- Applicant has not guaranteed to use rigorously tested technology
- Insufficient water capacity on site to put out a fire
- Risk of contamination of SSSI
- Risk of landslides and land stability
- Ecological information is inaccurate
- Risk of fire
- Drainage and erosion
- Pound Road planning appeal dismissed on safety grounds
- Site does not meet NFCC guidelines (2023)

6.5 Many of the objections received raise concerns about the potential for the proposed development to be a fire hazard and the prospective consequences on surrounding ecology, environment and land stability, such as through airborne toxins or particles, contaminants running off site and reaching the River Severn, or explosions causing subsidence. In planning terms it is difficult to quantify how much weight should be apportioned to concerns around a development being a fire hazard. All developments have the potential to be a fire risk, some have greater risks than others, and there are a number of factors outside the control of a Local Planning Authority that can influence whether a fire occurs and the circumstances under which it would (i.e. weather, equipment faults, vandalism, etc).

6.6 Risk of fire is not, in itself, a material consideration covered by planning policy. However, there are documented examples of fire risks associated with BESS developments. As a relatively new and developing area of technology, knowledge and innovation are growing rapidly in the current climate. The National Fire Chief Council (NFCC) have published advice on how best to design BESS sites to deal with potential future fire hazards, although this advice is not necessarily enforceable through the planning system, regardless of how useful it may be. This is not an ideal situation; whilst a Local Planning Authority may recognise the value of benefit of such recommendations, it is largely at the discretion of the individual Applicant whether they wish to incorporate the NFCC advice.

6.7 Members are asked to note that the NFCC recently opened its consultation on the next version of its grid scale BESS planning guidance that will supersede the version published in 2023. This is referred to under relevant sections later

in the report.

7. STATUTORY REPRESENTATIONS

7.1 Cllr Carolyn Healy: **Object**

- Grid connected battery storage is an essential part of the transition away from fossil fuels.
- There is fear around risk of fire even though such events are few.
- The highest levels of safety must be designed in and adhered to.
- In the absence of national policy for such matters I would requested this development comply with the National Fire Chiefs Council safety recommendations in full. In its present form the proposals do not appear to do that.
- The site is next to Lydebrook Dingle SSSI and any water run-off, especially related to an on-site fire, would flow into the Lydebrook.
- Area is known for ground instability.
- A fire that led to thermal runaway and an explosion could destabilise the slope.
- The Ecological Assessment does not consider the impact of fire on the SSSI.
- Natural England should be consulted.
- Site is adjacent to World Heritage site and must not have negative detrimental impact.

7.2 Little Wenlock Parish Council: **Object**

- Request that application is determined by Planning Committee.
- The site lies close to the SSSI of Lydebrook Dingle. Lydebrook Dingle and is a Site of Special Scientific Interest (SSSI) and is of national conservation importance.
- Concerns about water use to cool battery storage sites during a fire. The close proximity of such an important natural site with internationally important habitat for wildlife raises concerns. The fact the contaminated water if allowed to enter the water course will ultimately end up in the River Severn a source of water for human consumption. Policy ER1 does not appear to have been met.
- The area the site sits in is well known for instability.
- The borehole reports produced are dated 1978 and may not satisfy Policy BE9. Jiggers Bank has moved seriously in more recent times. With a major stabilisation project carried out in the 21st Century both road and the bank opposite. As already stated not too far from the site major stability works are being undertaken. Before any determination of the application Little Wenlock Parish Council would like to see evidence of more recent borehole cores.

- There are concerns about the proposed site access so close to Jiggers Bank Roundabout and the steep slope on Buildwas Bank from Buildwas preventing clear vision. If the application is given consent highways safety must be included in conditions.
- It is also noted there is no access to mains water on site. If given consent Little Wenlock Parish Council would like to ask for a condition asking for a water accessibility in the case of fire. To ensure that any fires on site can be dealt with efficiently.
- The site is extremely close to property within Little Wenlock Parish and just outside it is essential these properties and the residents should be able to carry out their day-to-day activities without effect from the site. The re profiling of the site is going to mean a huge mound of made up earth close to the nearest property. The re-profiling should not put any neighbouring property in danger of damage the works to be carried out.
- National fire chief statement Chiefs Council guidance on BESS sites should be followed to ensure the local fire authority is able to manage any fire on site.

7.3 The Gorge Parish Council: **Object**

- The location is known to be an area of instability
- It is an impact zone for Lydebrook Dingle SSSI
- The attenuation arrangements proposed are inadequate
- Access/egress arrangements are inadequate

7.4 Highways, Drainage, Ecology, Built Heritage, Archaeology and Environmental Health – **Support Subject to conditions**

7.5 Coal Authority: **Comment**

Recommend inclusion of planning conditions

7.6 Shropshire Fire Service: **Comment**

The Fire Service have provided the National Fire Chief Council's advice on planning for Energy Storage Systems. This is not statutory although the NFCC encourage early engagement from developers with the Fire & Rescue Service during the planning process.

8. APPRAISAL

8.1 Having regard to the development plan policy and other material considerations including comments received during the consultation process, the planning application raises the following main issues:

- Principle of development and low carbon development/renewable energy
- Highway safety

- Ecology and wildlife (including drainage, landscape and land stability)
- Heritage assets and visual impact
- Impact upon residential amenity (including noise)
- Other matters: Safety Considerations

8.2 The site lies just inside Telford's rural area. The adjacent road, Jiggers Bank, forms the boundary between the urban area and rural area. Therefore, the land to the east of Jiggers Bank is urban land whereas to the west it is rural area. For this reason Policy SP3 is the guiding policy on the principle of development. Policy SP3 states,

"The Council will support development in the rural areas where it addresses the needs of rural communities. Development is directed to the use of previously developed land and to settlements with good infrastructure. Where development is proposed on best and most versatile agricultural land (Grade 1, 2 and 3a) the economic and other benefits of the land will be taken into account".

8.3 The site is evidently not previously developed land and fails Policy SP3 in this respect. The question of whether it meets the needs specifically of rural communities is difficult to quantify because the energy stored by the proposals would not necessarily be limited to use by only rural communities, so it may meet this aspect of the policy either in full or in part – or it may not meet it at all depending on where the stored energy is used. The Applicant has submitted an Agricultural Land Classification survey which grades the site as Grade 3b and the policy is met in this respect. The site could be accepted as having access to good infrastructure in terms of proximity to highways and the pylon.

8.4 For these reasons the Local Planning Authority considers it to be a mixed picture over how thoroughly the proposals meet the requirements of Policy SP3 and therefore whether the principle of development can be supported.

8.5 The NPPF promotes a presumption in favour of sustainable development. Within the TWC Local Plan, Policy SP4 states,

"The Council will support development proposals that are considered to be sustainable. Development is considered to be sustainable where it is in accordance with national and Local Plan policies, taking into account other material considerations".

As the LPA considers the proposal not to fully meet the requirements of Policy SP3, the question of whether the proposals can be considered as sustainable development needs to be considered more carefully and what other material considerations there may be in coming to a balanced judgement.

8.6 A key consideration here is the climate change agenda and national push to move towards a lower carbon economy. Para 157 of the NPPF states that the

planning system should support the transition to a low carbon future in a changing climate.

- 8.7 The Applicant states in their Planning, Design & Access Statement (para 3.5) that “the batteries produce no emissions or pollution during normal operations and are considered to be a low carbon enabling technology”. Whilst the proposal development would not generate renewable energy as such, it would store excess energy produced during times of less energy usage and release it for use during times of higher energy usage. This would save excess energy going to waste. The Applicant also states the proposals promote a reduction in carbon due to the proximity of the pylon to the development, requiring a reduced length of cable and a short time to import/export energy from the batteries.
- 8.8 It should be noted that the energy stored by the proposed batteries may not necessarily be produced in a renewable manner; the batteries may just as easily store energy produced from fossil fuels. This perhaps weighs against the supposition that the batteries are as ‘green’ as it is suggested they are by the Applicant. Then again, however the energy is produced, if the batteries create a platform for it to be stored and used rather than wasted, this is an improvement over the existing energy situation. These matters need to be weighed against each other.
- 8.9 Local Plan Policy ER1 refers to renewable energy. Whilst the proposed battery storage facility is not necessarily generating, or even storing, renewable energy, Policy ER1 states, “*The Council promotes and supports low carbon development, development that is well adapted to the impacts of climate change*”. This proposal is a movement towards enabling lower carbon development and technologies, and therefore ought to be viewed in the context of Policy ER1.
- 8.10 Policy ER1 states,
- “The Council supports renewable energy development (excluding wind turbines) where it has been demonstrated that all the following criteria have been met:*
- i. There is no significant adverse effect on highway safety, landscape or townscape, ecology and wildlife, heritage assets, areas or features of historical significance or amenity value;*
 - ii. There is no significant adverse impact on local amenity, health and quality of life as a result of noise, emissions to atmosphere, electronic interference or outlook through unacceptable visual intrusion;*
 - iii. Where development is granted, mitigation measures will be required as appropriate to minimise any environmental impacts;*
 - iv. All development proposals for renewable energy generation schemes should provide for the site to be reinstated to its former condition should the development cease to be operational; and*
 - v. When considering the social and economic benefits, account will be taken of the degree of community participation/ownership of a scheme.”*

The remainder of this report considers the proposals against ER1 and other relevant policies within the Local Plan.

- 8.11 The LPA would draw Member's attention to the advice published by the National Fire Chief Council (NFCC) on Grid Scale Battery Energy Storage System (BESS) for planning. This is particularly for Fire & Rescue Services (FRS) and provides detailed advice on what is currently considered best practice on the following detailed matters:

1. Information requirements
2. System design, construction, testing and decommissioning
3. Detection and monitoring
4. Suppression systems
5. Site access
6. Water supplies
7. Emergency plans
8. Environmental impacts
9. Recovery

Some of the matters within the NFCC advice fall outside the remit of the planning system. Other matters have an element of overlap, such as site layout, access and some aspects of water supplies (i.e. drainage). A key issue, however, is that the NFCC advice is not statutory or enshrined in policy at either a local or national level, which gives it limited weight in assisting the LPA in negotiating on BESS schemes. To put it another way, whereas a LPA can refuse an application against policy or legislation, it is less sound to refuse an application on the basis of guidance or advice and be confident that such reasoning would stand up to inquiry were the Applicant to appeal.

- 8.12 The LPA has asked the Applicant to take on board the recommendations of the NFCC where applicable to this site. The Applicant's response to those individual matters is noted at the relevant points in the remainder of the report.

Policy ER1(i). There is no significant adverse effect on highway safety, landscape or townscape, ecology and wildlife, heritage assets, areas or features of historical significance or amenity value;

Highway Safety

- 8.13 Policies C3 and C5 are the key highways policies within the Local Plan. If the proposal is found to comply with those policies, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.14 In respect of highway safety, the Local Highways Authority (LHA) have assessed the proposals and consider them to be acceptable subject to conditions securing a Site Environmental Management Plan and delivery of Parking and Turning Areas.
- 8.15 Whilst the LHA acknowledge the BESS advice raised by the NFCC, these are not material considerations in the LHA's consideration of the acceptability and impact of the proposed development on the public highway. The NFCC's

advice is focussed on the operational requirements of the BESS, which is a different remit to that of the LHA.

8.16 A particular concern raised in public representations is that the site has only one proposed access/egress. The NFCC guidance recommends “at least two separate accesses to account for opposite wind directions/direction” in the event of a fire hazard. This is not a requirement for this site from the perspective of the LHA, although they have confirmed they would be willing to engage with the Applicant if they wished to consider providing a second access.

8.17 The LPA requested the Applicant provide a second access but after consideration they declined to make this amendment. The Applicant has provided supporting information to say,

“The internal roads offer two ‘access’ points to the infrastructure, which our independent consultants consider enables any emergency personnel full coverage of the site in the unlikely event of an incident. This corresponds with the detail outlined in the source documentation of the NFCC guidance (CFA’s design guidelines, Australia, 2023) relating to the reasoning why multiple access points are expected into each section of a BESS compound. Having liaised with fire professionals, it is apparent that should an event occur, the responders are likely to enter the site on foot and not necessarily take the emergency vehicles into the BESS area, with hoses and other apparatus needing to be mobile and setting up in a relevant location to the fire/occurrence. The proposed layout therefore includes sufficient space for emergency responders to take up defensive firefighting from a safe distance.” As the NFCC guidance is only advice it significantly reduces the LPA’s powers to require that a second access is included.

8.18 The Applicant has confirmed that the applicant includes a swept path analysis to accommodate a fire engine. The proposed access and internal layout have been designed to safely accommodate up to 16.5m long articulated heavy goods vehicles (HGVs), and as such is suitable for enabling emergency vehicles to access and egress the site safely (which would be smaller in size). The Applicant comments that, *“The site is accessed from the north via the A4169 and benefits from two internal access points located on the western side of the facility. Consideration was given to the provision of a secondary access, although one access is appropriate and the site benefits from two internal access points. The suitability of the proposed access arrangement has been demonstrated through swept path analysis.”*

8.19 Based on the LHA’s assessment of the proposals against the policies in the Local Plan, the proposal is found to be acceptable subject to the conditions stated in para 8.14.

Ecology and Wildlife (including Drainage, Landscape and Land Stability)

- 8.20 Policy NE1 in the Local Plan is the key planning policy with regards to ecology. If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.21 Many objections have been received raising concerns over the proximity of the proposals to Lydebrook Dingle SSSI and the River Severn, which lies downhill of the site. The majority of these concerns involve the impact upon the environment in the event of a fire, from either airborne toxins and particles landing on the SSSI and its environs or water used to extinguish a battery fire running off site and polluting the brook, the R. Severn and any environs due to any battery acid or other contaminants finding their way into the water system.
- 8.22 The ecology considerations for this proposal are inextricably linked with the drainage matters. Due to the topography of the land and gradients of the site and its environs, landscape is also relevant here, as this exacerbates the impact of any water run-off and its consequences.
- 8.23 The Council's Ecology Specialist advises that the main potential threat to Lydebrook Dingle and the brook is any change in drainage from the site. This could be during the operational phase, such as a fire hazard, but also during the construction phase, when parts of the site would be stripped to bare earth.
- 8.24 The proposed landscaping would provide over 10% Biodiversity Net Gain (BNG) and, whilst the site would look different, it would be an overall improvement in value to wildlife compared to the grass field there at present and the new habitats would complement the SSSI in the long term.
- 8.25 Whilst it may seem counter-intuitive, as long as there are no off-site impacts or indirect effects, the finished site would result in an area of hardstanding surrounded by meadow and trees, with very little human disturbance, so would deliver a gain for wildlife.
- 8.26 The Council's Ecology Officer supports the proposals subject to the following conditions:
- Development in accordance with Ecological Report
 - Strategic Newt Licensing
 - Badger Mitigation Strategy and Method Statement
 - Details of Landscaping Design
 - Construction Environmental Management Plan
 - Nesting/Roosting boxes for Birds/Bats
 - Lighting Plan
 - Habitat Management Plan
 - Biodiversity Net Gain Monitoring Plan
- 8.27 Policies ER11 and ER11 in the Local Plan is the key planning policies with regards to drainage. If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).

- 8.28 The Council's Drainage Engineer comments that the developer has undertaken work to demonstrate that the site has an existing drainage connection into Lydebrook Dingle and to establish a system that replicates existing flows without constituting an increase in flow rates or point discharge. The site is immediately upstream of the SSSI and a Construction Environment Management Plan is also required. The detailed site drainage design will also need to consider water management, including in the event of a fire, accounting for containment and the proximity of the site to a SSSI.
- 8.29 To address these concerns the Applicant has submitted a Drainage Strategy Drawing. This includes a number of mitigation measures including:
- a below ground water tank for storing water to be used in emergencies (i.e. fire hazards) and to allow 2hrs' worth of water to be used by the Fire Service
 - flow control devices to restrict water run-off rates
 - run-off routing to follow existing site conditions
 - embankments to mitigate run-off

The Applicant contends these measures will provide a betterment, including reducing erosion of the land below the site (to the south).

- 8.30 Furthermore, the Applicant states that the proposed BESS is underlain by low permeability strata and there are no active groundwater abstractions with a 2km radius. The solid geology underlying the site is designated as a secondary aquifer. The natural clay immediately beneath the site serves as a containment layer above the aquifer.

- 8.31 The Applicant has also provided supporting information to confirm they are liaising with the Fire & Rescue Service (FRS) with regards to developing a firefighting strategy including a strategy of dealing with contamination. The detailed design would ensure that firewater run-off is contained and treated, with measures in place which will be detailed within the Emergency Response Plan. A penstock would be provided which will be shut off in the event of a fire to allow water to be stored within the below ground tank. When closed, the penstock shuts the network off and as such any used water will not be able to leave the site. For these reasons the Applicant considers there is no risk of polluted water getting into the network. Following this, any used water would be pumped out and cleaned.

- 8.32 The Council's Drainage Engineer accepts the proposals in principle and is satisfied that the details can be secured via planning condition. These conditions include:
- Details of surface water drainage
 - Method statement for interim drainage during construction and sediment run-off measures
 - SuDS management plan
 - Details of exceedance flow routing

- 8.33 Policy BE9 in the Local Plan is the key planning policy with regards to land stability. If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.34 Ground Investigation reports have been submitted with the application. The Council's Geotechnical Specialist agrees with the findings and recommendations within the report. The main concern of the Geotechnical Specialist is that drainage from the site does not cause erosion to the geology below. The Council's Drainage Engineer confirm the Drainage Strategy Drawing achieves this aim and it will be further realised by the recommended planning conditions listed in para 8.30.
- 8.35 On the basis of the above discussion, it is considered that, on balance, sufficient mitigation proposals can be secured via planning conditions to ensure the development meets the requirements of Policies NE1, BE9, ER11 and ER12.

Heritage assets, areas or features of historical significance or amenity value

- 8.36 Local Plan Policy BE3 refers to Ironbridge Gorge World Heritage Site (WHS) and states that any harm to it arising from proposed development must be clearly justified. The site lies just outside the WHS and Policy BE3 states, *"The Council will not support proposals...adjacent to the World Heritage Site that adversely affect the following key features:*
- i. The existing topographical character and landscape quality, including the stability of the slopes and river banks;*
 - ii. The setting of the World Heritage Site including the existing skylines and views to, and from, the Gorge;*
 - iii. The area's natural diversity and ecology, including amongst others, Sites of Special Scientific Interest and Local Wildlife Sites; or*
 - iv. The area's distinctive archaeological resource.*
- In addition to these features, development within the World Heritage Site will need to take account of flood risk and drainage".*
- 8.37 If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.38 Policy BE3(i) and (iii) have been addressed in the previous section of the report, which concludes that consultees are prepared to support the proposals subject to conditions. This section of the report considers Policy BE3(ii) and (iv).
- 8.39 The Council's Built Heritage Specialist considers the existing site to have a neutral impact upon the settings of the Ironbridge Gorge WHS and Severn Gorge Conservation Area (SGCA). The nearest heritage assets lie 0.4km to the southeast, although there are no reciprocal views between these heritage assets and the site.

- 8.40 With regards to the proposals, the Council's Built Heritage Specialist considers that the currently proposed hedging and trees, once established, would mitigate against reciprocal views of the battery storage units and the settings of the WHS and the SGCA. However, the tree planting would be unlikely to successfully screen the 6.5 high metering substation equipment from view and would create a rather jarring visual which would be at odds with the rural nature of the site. The metering substation would be visible from Jiggers Bank which would cause harm to the settings of both the WHS and the SGCA. The harm identified would be less than substantial in NPPF terms, and would be contrary to local policies BE1(i, iii, v), BE3(i, ii) and BE5(iii, iv) and the NPPF section 16, paragraphs 201, 203, 205, 206 and 208.
- 8.41 In response to these concerns the Applicant has offered more landscaping along the southwest and southeast boundaries of the site. However, these mitigation are unlikely to overcome the heritage objections in full and the proposals are considered contrary to the above-named policies.
- 8.42 With regards to Policy BE3(iv) there is no known archaeology under the site and therefore this criterion is unaffected by the proposals.
- 8.43 On balance, therefore, it is considered that the proposal partially meets the requirements of Policy ER1(i) with respect to highways, ecology, drainage, land stability and archaeology but fails to meet the requirements in terms of impact upon heritage assets.

Policy ER1(ii) There is no significant adverse impact on local amenity, health and quality of life as a result of noise, emissions to atmosphere, electronic interference or outlook through unacceptable visual intrusion

Noise

- 8.44 Policy BE1(xi) of the Local Plan refers to protecting amenity and ensuring new development does not result noise, pollution or other disturbances. If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.45 A number of public objections have been received raising concerns about noise pollution. The Applicant has submitted a Noise Impact Assessment which has been assessed by the Council's Environmental Health Specialist, revised in response to their questions and they comment as follows:

"The revised assessment is considered robust with clarity around previously raised questions provided. It has modelled the noise, taken on board comments regarding noise reductions through an open window, height of barrier, percentage on time of some equipment proposed and promoted revised noise levels at nearby receptors.

Given the new noise levels predicted at noise sensitive receptors it is noted that these are only 1dB below background in the day, 6dB above background in the evening and 11dB above background during night time hours. Potential daytime noise levels are considered reasonable. The evening and night time noise levels stated are more than 5dB above background which guidance suggests could result in complaint. However, the noise assessment highlights the potential to consider absolute noise levels where background noise levels

are low and that during all times of day for internal and external spaces of the nearest receptors predicted noise levels would be within guidance levels stipulated for residential properties”.

- 8.46 Given the above it is suggested that the noise created by the proposed development would not be received at sufficient volume to create a significant amenity impact. Noise may on occasion be audible but at a level within guidance levels for the receptors in question at all times of day. It is noted that this relies on cooling fans running at 50% during the night. A 2.5m acoustic barrier is proposed on the south-east part of the site, which will contribute towards mitigating sound received by the nearest receptors.
- 8.47 On balance, it is considered that the noise impacts of the proposal can be accepted.

Air Pollution

- 8.48 The proposed development is unlikely to contribute to emissions to atmosphere or electronic interference as part of its daily operations. Were there to be a fire hazard, resulting in airborne emissions or pollution, the Applicant has submitted an Outline Battery Safety Management Plan which includes safety measures to reduce fire and contain it in the event it does occur. This includes information on their intention to choose the safest battery chemical in accordance with standardised and certified testing and effective detection and monitoring in the event of a fault or issue on site.

Visual Impact

- 8.49 Policy BE1(i, iii, v)) of the Local Plan refers to design quality and highlights, inter alia, that new development should respect the context of its local environment, setting and important views to and from the site. If the proposal is found to comply with this policy, it follows that it will satisfy this aspect for Policy ER1(i).
- 8.50 The existing site is an undeveloped field. The infrastructure being proposed would result in a harmful change to this part of the landscape, despite the landscaping mitigations being proposed. This detrimental impact needs to be weighed against any benefits brought about by the proposals in terms of enabling lower carbon technology and any environmental benefits such as BNG.
- 8.51 It is accepted that the visual impact should improve over the 40-year life span of the development as the landscaping matures and establishes. However, the impact of such a development would be considerably less if were located within an urban area.
- 8.52 On balance, it is considered that the proposal partially meet the requirements of Policy ER1(ii) but fail to meet the requirements in terms of achieving no significant detrimental impact.

Policy ER1(iii). Where development is granted, mitigation measures will be required as appropriate to minimise any environmental impacts.

- 8.53 As discussed in the separate sections above, mitigation measures have been designed into the proposal and planning conditions have been recommended to ensure environmental impacts are reduced wherever possible.

Policy ER1(iv). All development proposals for renewable energy generation schemes should provide for the site to be reinstated to its former condition should the development cease to be operational.

- 8.54 The Applicant is proposing that the lifespan of the development will be 40-years, after which time it will be reinstated. Planning condition to ensure the reinstatement of the site are being recommended and additional conditions to ensure any BNG benefits are retained as part of the reinstatement (rather than being lost through de-commissioning works).

Policy ER1(v). When considering the social and economic benefits, account will be taken of the degree of community participation/ownership of a scheme.

- 8.55 From the information submitted with the application the LPA would describe the level of community engagement or participation with this scheme as extremely limited.

- 8.56 In their Planning, Design & Access Statement the Applicant describes their community involvement as consisting of pre-application discussions with Little Wenlock Parish Council and a drop-in session for the community held in October 2023. It refers to the Applicant's approach to community benefits as:

“Renewable energy infrastructure delivers on Telford and Wrekin Council’s carbon neutral aspirations while providing security of energy supply and socioeconomic benefits to the local and national economy. While these benefits can be local to the project, they are more often enjoyed across a wider community. The applicant recognises the local community’s commitment to hosting its renewable energy development and is committed to collaborating with the relevant parishes to establish a community benefit fund. This fund can be used by the community, along with various other advantages generated by the proposed project. The applicant would be willing to consider proportionate options with the parish at an appropriate time to explore this opportunity”.

- 8.57 Whilst the Applicant has described their willingness to participate in such a fund or community project, no firm details have been put forward to show that this is a likely possibility or that there has been significant buy-in from any parties within the community.

Consideration of how the proposal measures up against Policy ER1

- 8.58 To summarise the above discussion, the proposals can be considered to meet/conflict with Policy ER1 as follows:

- ER1(i) – the proposals are considered to comply with the policy in terms of highways, ecology, drainage, archaeology and land stability subject to the mitigation and planning conditions recommended. However the

proposals are not considered to meet the requirements of the policy in terms of built heritage.

- ER1(ii) – the proposals are considered to meet the requirements of the policy with regards to noise and air pollution subject to the mitigation and planning conditions recommended. Electrical interference is unlikely to be an issue. However, on grounds of visual impact the proposals fail to meet the policy.
- ER1(iii) – the proposals include mitigation measures as part of the submitted drawings and/or document and consultees have recommended planning conditions where appropriate, therefore the proposals are considered to meet the requirements of this part of the policy.
- ER1(iv) – the proposals are for a designated period of 40-years and state the site will be reinstated to a field when the use ceases. In addition, planning conditions recommend measures to ensure any enhancements in BNG are not lost through the decommissioning or reinstatement process.
- ER1(v) – whilst the Applicant has indicated they are willing to participate in community participation/ownership of a scheme, there appears to have been little engagement with the community and no material proposals included as part of this planning application to indicate such community participation/ownership is likely to come forward. The proposals are found not to meet this requirement of the policy.

8.59 Therefore, the proposals partially meet ER1(i) and (ii) and partially conflict, the requirements of ER(iii) and (iv) are met, and the proposals fails against ER(v). For both ER1(i) and (ii) the concerns relate to visual impact and built heritage, specially the impact upon the appearance of the site and the entrance to the World Heritage Site.

8.60 The matter for Members to consider, therefore, is whether the benefits the proposals would bring about with regards to enabling lower carbon technology and the storage of energy that might otherwise be wasted, outweigh the harms in terms of visual impact, the World Heritage Site and the lack of community participation/ownership when considering the social and economic benefits.

8.61 As the proposals have provided mitigation in terms of highways, drainage, ecology, land stability and amenity/disturbance, these concerns are considered to have been addressed subject to the recommended planning conditions.

Other Matters: Safety Considerations

8.62 Within the public representations concerns have been raised about the safety aspects of the proposed development, including references in respect of a BESS fire in Liverpool in 2016 and a planning appeal at Pound Road, Hawkchurch, East Devon which was dismissed by a Planning Inspector in

February 2024. The Applicant has offered the following information to address these concerns.

- 8.63 There would be automatic shut-down in the event of a fire incident. The Battery Management Systems (BMSs) in each unit are able to identify issues at cell level. If any performance variation or temperature rise or anything unusual is detected, the BMS reacts quicker than human reflexes and can isolate that particular battery rack/zone.
- 8.64 Fire curtains are not needed with this design. The Applicant has advised that most notable incidents are centred around large container storage systems and this proposal is not of that design. The new draft NFCC guidance highlights some of the differences between what it called “original designs that resembled large shipping containers” and “more modern” cabinet designs.
- 8.65 With regards to the technology, the Applicant has confirmed the proposals will use best-in-class technology. The batteries can last for up to 15 years. For this reason the LPA recommends that the Outline Battery Storage Management Plan (OBSMP) should be updated every 5 years and this will be dealt with by condition.
- 8.66 The Carnegie Road, Liverpool, BESS fire is the only example of such a fire that has happened in the UK. The Applicant advises that technology has moved on and improved since and this scheme is designed differently to the Carnegie Road scheme in several ways:
- The way the battery energy storage cubes/containers will be built;
 - The amount of fire loading;
 - The amount of fuel that can ignite and be involved in a fire.

All these factors would result in a design that greatly reduces the risk of a thermal runaway event. With smaller cube units, the whole design is very different and behaves differently. The Carnegie Road site was commissioned in 2018 / 2019 and would have been based on a 2016 design (roughly). The industry has moved on 8 years, there have been significant lessons learned, according to the Applicant.

- 8.67 Thermal runaway is a process that involves the building-up of several stages – it does not happen spontaneously. The stages involved in the built-up to thermal runaway include:
- Breakdown of the secondary electrolyte interphase layer (SEI) which can happen if the system is exposed to extreme temperatures (above 100°C);
 - Electrolyte breakdown which can release flammable gases;
 - Separator melting at extreme temperatures; and
 - Cathode breakdown which can release oxygen.

- 8.68 BESS designs include multi-layer controls designed to prevent the build-up to thermal runaway. These have been described in the Applicant's OBSMP addendum letter dated 25 March 2024. Section 4 of the addendum, for example, describes each level of a BESS design (material, cell, pack, cabinet) and explains the safety controls that are built into each of these levels. Rigorous testing is undertaken at each of these levels to demonstrate compliance with internationally recognised standards. With robust selection criteria and safety testing at each level, available test data assures the probability of cell thermal runaway failure is reduced to zero.
- 8.69 In terms of separation distances, the draft NFCC guidance suggests "adequate separation between the BESS enclosures to ensure that the radiant heat from a thermal event in one BESS will not trigger a secondary event" and confirms "separation can be reduced to at least 3 feet or 0.914m between BESS if tests such as UL 9540A shows propagation does not occur".
- 8.70 The Applicant advises that storage units are put through rigorous testing such as UL 9540A and, therefore, based on the manufacturer's testing and guidance, the separation distances proposed as part of this application are considered appropriate in accordance with the draft NFCC guidance.
- 8.71 With regards to the Pound Road BESS appeal the Applicant has provided the following commentary:
- Pound Road BESS was dismissed at appeal in February 2024 (appeal reference APP/U1105/W/23/3319803). One of the main issues was whether there was sufficient information on the health and safety measures proposed and the extent to which there would be a significant risk to local residents and the environment. The Inspector concluded the planning benefits did not outweigh the potential considerable harm arising from the proposal. The Inspector could not justify a decision other than that in accordance with the Development Plan. In this case, the Development Plan comprised the East Devon Local Plan and the National Planning Policy Framework (NPPF) 2023.
 - Pound Road BESS was found to be in conflict with Strategy 39 of East Devon District Council Local Plan which supports renewable or low carbon projects where they are subject to best practice guidance and the adverse impacts being satisfactorily addressed. The Inspector warranted this conflict considerable weight.
 - As Pound Road BESS did not demonstrate adequate measures for the containment or removal of contaminated firewater which could lead to the contamination of an aquifer (a source of drinking water to approximately 12 houses), it was found to be contrary to Policies EN14 and EN18.
 - In terms of environmental setting and sensitivity. Pound Road BESS was in the vicinity of 32 wells/boreholes and springs, 10 of which were directly below the groundwater gradient of the site and two immediately adjacent to the east. The groundwater beneath Pound Road BESS permeated into

an aquifer which via borehole abstractions supplied approximately 12 houses with their water.

- Pound Road BESS proposed a facility with a capacity of 120MW comprising 48No. battery containers separated by 2m. The Inquiry was not given sufficient evidence regarding the following matters (not exhaustive):
 - Existing and proposed land levels or an earthworks strategy confirming if spoil could be accommodated / reused sensitively;
 - Clear information about the proposed gravel surfacing, its benefits, or its effectiveness across various potential contaminants; and
 - Evidence of early pre-application engagement with the fire service nor evidence that safety was considered before the Pound Road BESS application was made.
- The Pound Road BESS planning application (reference 22/2216/MFUL) was not accompanied by an OBSMP report.
- Given the absence of submitted fire safety evidence, the Inspector in the Pound Road BESS appeal based several of its conclusions on a fire that occurred at a BESS facility in Liverpool in 2020, the only incident of its kind in the UK. The Applicant's fire safety experts (some of whom have been involved in the response to the Liverpool incident) do not advise judging new proposals on the conclusions from this event and proposals should be considered on an individual site by site basis. The Pound Road BESS is very different from modern BESS developments (proposed and operational) in several ways including its access arrangements, layout, management, manufacturing, monitoring, quality assurance, and technology. In the years since 2020, in-built mitigation and safety features have been greatly enhanced to reduce the impact and scale of any incident. There has also been a greater emphasis on operators to ensure risk information is collated, disseminated, and readily available to assist emergency responders.

9. CONCLUSIONS

- 9.1 On balance, it is considered that the proposal is partially compliant with Policy ER1 of the Telford & Wrekin Local Plan 2011-203. This means the principle of development under Policy SP3 is partially met.
- 9.2 Under Policy SP4 and the presumption in favour of sustainable development, a development is considered sustainable where it meets the policies within the Local Plan. As the discussion above has set out, these proposals are considered to comply with some of the policies and fail to meet others. For clarity, the policies it fails to meet are BE1, BE3, BE5, ER1(i, ii, v). This means

the proposals partially comply with SP4, and therefore the development is considered partially sustainable.

- 9.3 Viewed against the context of the Council's Climate Emergency and matters around climate change more globally, it is difficult to determine how much one issue should be weighed against the other; particularly when matters connected to climate change (such as encouraging development that will enable lower carbon technology) are being judged against something as unique as the impact upon the Ironbridge World Heritage Site or matters which contribute to locally distinctive identity and visual appearance.
- 9.4 In all likelihood this development could be located elsewhere provided there is a pylon available where the proposals would have less of a visual impact and prove to be more of a sustainable development than it is currently judged to be. However, this is the site the Applicant has put forward and it must be considered on its merits or otherwise. Recent public inquiries at New Works Lane and Steeraway Farm for solar farms within the rural area were allowed by the Inspector despite the visual impact on landscape over a much larger area, albeit one less sensitive than the WHS. These decisions indicate the general direction of travel from the government and the Council needs to be mindful of this when making decisions.
- 9.5 The Applicant has provided information to demonstrate that safety concerns associated with the Liverpool BESS fire and thermal runaway are being addressed through updated technology and a different design approach to what was typically commissioned in 2016. The Pound Road BESS appeal was refused due to a lack of information (which has been submitted in this case) and was a materially different scheme in terms of scale and design.
- 9.6 Taking all the discussion points into account, it is clearly a finely balanced judgement regarding whether the proposal can be supported or not. However, the LPA considers that there is just sufficient weight to comply with enough policies of the Local Plan and NPPF to recommend the application for approval.

10.DETAILED RECOMMENDATION

- 10.1 Based on the conclusions above, the recommendation to the Planning Committee on this application is that **DELEGATED AUTHORITY** be granted to the Development Management Service Delivery Manager to **GRANT PLANNING PERMISSION** (with the authority to finalise any matter including conditions, legal agreement terms, or any later variations) subject to the following:

- A) The following conditions (with authority to finalise conditions and reasons for

approval to be delegated to Development Management Service Delivery Manager):-

A04 Time Limit Full

ACustom Temporary permission for 40 years

BCustom Scheme of Decommissioning works

BCustom Ecological Assessment Report to accompany Scheme of Decommissioning

BCustom Post-Development Ecological Habitat Report

BCustom Biodiversity Monitoring Reports

B150 Site Environmental Management Plan

B055a Coal Authority – scheme of intrusive site investigations and remediation works

B055b Coal Authority – statement of declaration that site has been made safe

BCustom Battery Storage Management Plan

BCustom Emergency Response Plan

B061a Greenfield Foul and Surface Water

B076 SUDS Management Plan

B077 Interim/Construction Drainage Measures

B078c Exceedance Flow Routing

B010 Details of materials

B159 Strategic Newt Licencing - European Protected Species

B159 Badger Mitigation Strategy and Method Statement

B121 Landscaping Design

B145 Lighting Plan

B141a Erection of artificial nesting/roosting boxes

B142 Habitat Management Plan (post construction)

B158 Biodiversity Net Gain Monitoring Plan

C091 In accordance with Ecological Survey

C013 Parking, loading, unloading and turning

C050 Development in accordance with Noise Assessment

C081 Works in accordance with AIA/AMS (Trees)

C074 Tree protection

C038 Development in accordance with plans

Informatives

I11 HIGHWAYS – Provision of access over footway or verge (S184 Licence)

I35 Streetworks

I17a Coal Authority – High Risk Area

I32 Fire Authority

I40 Conditions

I41 Reason for Grant

RANPPF2 Approval following amendments - NPPF