

PRIORITIES FOR THE CLIMATE CHANGE, ENVIRONMENT, AND INFRASTRUCTURE COMMITTEE, WALES WRITTEN SUBMISSION FROM THE MINERAL PRODUCTS ASSOCIATION,

INTRODUCTION TO MPA

The Mineral Products Association (MPA) is the trade association for the aggregates, asphalt, cement, concrete, dimension stone, lime, mortar and silica sand industries. With the affiliation of British Precast, the British Association of Reinforcement (BAR), Eurobitume, MPA Northern Ireland, MPA Scotland and the British Calcium Carbonate Federation, it has a growing membership of 530 companies and is the sectoral voice for mineral products. MPA membership is made up of the vast majority of independent SME quarrying companies throughout the UK, as well as the 9 major international and global companies. It covers 100% of UK cement and lime production, 90% of GB aggregates production, 95% of asphalt and over 70% of ready-mixed concrete and precast concrete production. In 2018, the industry supplied £16 billion worth of materials and services and was the largest supplier to the construction industry, which had annual output valued at £172 billion. Industry production represents the largest materials flow in the UK economy and is also one of the largest manufacturing sectors.

The mineral products industry is a key employer in Wales - providing direct employment to around 3,800 people at more than 200 sites and generating sales of £650m. The majority of those jobs are in rural areas where there are limited opportunities for secure employment. It has been estimated that more than 2,000 people are indirectly employed supporting the sector, largely through the energy, transport and contracting services it requires.

While the industry is significant in its own right, it is important to recognise the vital role it plays in supporting the Welsh construction sector, which represents six per cent of the Welsh economy, has a turnover of £3 billion and provides 88,000 jobs.

While most Welsh mineral products support local projects, some high value minerals are exported further afield across the UK. These include high polished stone value (PSV) sandstone used in road surfacing because its skid resistance qualities offer significant road safety benefits, high specification aggregates used in the rail network, slate and cement. This reflects the importance of many of the minerals produced in Wales, to the wider UK economy.

MPA Wales/Cymru has produced “Delivering for Wales - Priorities for Government, Priorities for Industry”, which is attached to the end of this submission as an overview of our position on all relevant public policy matters.

For more information on this response please contact:
Dr Diana Casey, Director, Energy and Climate Change, diana.casey@mineralproducts.org

GENERAL RESPONSE TO THE PRIORITIES PROPOSED

Overall, the broad topics set out seem appropriate, and at a high level, the MPA can see only two obvious gaps which are industry and infrastructure for decarbonisation. There is also a

slight repetition between the priority on Climate Change and that of Net Zero, and it would be worth combining these into a single priority.

The key gap around industry is important because Wales has such a vital industrial base, which provides jobs for local communities as well as the materials that underpin other areas of the Welsh economy. Industry also forms a large part of Welsh greenhouse gas emissions. Ideally Wales should be looking at how to support industry so that a decarbonised industrial base can grow which can underpin the low carbon economy, providing essential jobs and vital materials. Wales needs to be careful not to try and meet its ambitious decarbonisation targets by taking policy decisions that result in its industry being offshored. Not only would this be detrimental to the Welsh economy and the essential jobs this supports, but it would not result in a reduction in global greenhouse gas emissions, as Wales would then need to import products from other parts of the UK or abroad to meet its demands. The priorities propose a timber industrial strategy for Wales and a Woodland for Wales Action Plan, but there is no similar document for Welsh industry. Given the importance of industry to Wales this is a significant omission and development of an industrial strategy for Wales should be a short-term priority to ensure industry is supported to decarbonise whilst remaining competitive.

Linked to this is the other gap identified on infrastructure for decarbonisation. In order to decarbonise the economy, key infrastructure including: hydrogen production and distribution; carbon dioxide transport and storage; and electric vehicle charging, will be required. Consideration of how to address these needs must be considered a priority in the short term. Putting plans in place to provide this infrastructure will give confidence to business and investors to start deploying decarbonisation technologies e.g. at industrial sites.

RESPONSE TO SPECIFIC DETAILS WITHIN THE PRIORITIES

In terms of the priorities set out, MPA has the following comments:

Climate change

Given the high proportion of industrial emissions within the Welsh border, care must be taken to ensure that territorial targets aren't met by deindustrialising Wales through policy decisions that result in unintended consequences to the wider economy. Keeping track of consumption emissions as well as territorial emissions will ensure that emissions in the goods and services imported to Wales aren't rising while territorial emissions are reducing. An important priority over the next 12-18 months should be to put in place a method of accounting for consumption emissions. Wales also has an opportunity to be UK and world leading and set targets on consumption emissions that sit alongside targets on territorial emissions. This is the only way to ensure Wales is truly net zero by 2050.

Energy

The priority on energy notes that energy generation in Wales will need to evolve. However, it's not just generation but energy infrastructure that will need to be updated and expanded to meet increased demand as all areas of the economy switch to low carbon electricity to decarbonise. UK industrial electricity prices are already some of the highest in the world and impact the competitiveness of domestic industries that compete in international markets.

Welsh Government must help ensure that the costs that are incurred in expanding electricity infrastructure do not fall disproportionately on Energy Intensive Industries (EIs). Any loss of competitiveness of Welsh EIs could impact their ability to attract investment to decarbonise and provide Wales with the vital low carbon materials it will need in future.

Energy efficiency and sources of renewable energy rely wholly or partly on minerals and mineral products, for example, most glass fibres are silica based (~50-60% SiO₂), whilst solar panels are faced with 6-7mm of glass meaning a 2m x 1m solar panel will contain a minimum 24kg of sand in the glass panel. Further, sand is used in Biomass energy generation and Fluidised bed boilers where the sand improves the combustion process.

Net Zero

MPA strongly agrees with the need to link the UK Emissions Trading System (UK ETS) with the European Union Emissions Trading System (EU ETS) and supports the advocacy that the Welsh Government have been undertaking on this. It is important to try and equalise the carbon price in Wales/UK with those of our nearest competitors in the EU. This should be a top priority for Wales with a high proportion of emissions from industry. Wales could also offer support to EIs by lobbying UK Government to provide state aid/ subsidies to EIs for the indirect costs of UK ETS and Carbon Price Support (CPS). This policy framework is one of the reasons behind the high industrial electricity prices that industry faces and any support to reduce this cost will help improve the competitiveness of Welsh industries.

Tree Planting

Many MPA member activities involve quarrying. As mineral extraction proceeds, the progressive restoration of sites follows quickly behind to ensure sites are restored to an agreed and acceptable after use. MPA members have planted around 535,000 trees in Wales over the last 5 years alone. Care is taken to choose a variety of native species that act to increase the biodiversity of the land. Trees are vital to reduce emissions and enhance biodiversity. However, trees are only really useful for this when they remain in the ground for as long as possible. The issue with trying to provide timber for uses such as construction (as mentioned in the tree planting priority) is that the conditions in the UK aren't necessarily ideal for growing the trees used for structural timber, 70% of which is currently imported. There are other issues associated with the use of timber which must be taken into consideration:

- Timber products such as Cross Laminated Timber (CLT) require the use of high carbon glues to give the timber strength. This material is not the green sustainable material that is usually associated with timber.
- Monoculture plantations grown to meet demands for timber, can result in low biodiversity and reduced amenity value.
- The storage of carbon in harvested wood products is only temporary. At end of life this carbon will be released into the atmosphere. Timber therefore acts as a temporary sink, delaying emissions, rather than permanently removing them.

Increasing ambition on tree planting is of benefit but the favouring of timber for construction won't help to enhance the Welsh environment or achieve significant emissions reductions.

With two cement plants, and local aggregate quarries, concrete plants and other mineral products, Wales is ideally placed to utilise local low carbon concrete for construction, rather

than importing timber. MPA has set out how the UK concrete and cement sector could go beyond net zero by 2050 in a roadmap published in October 2020^a. By utilising low carbon concrete, not only would Wales be able to construct durable housing that can adapt to the impacts of climate change such as overheating and flooding, but it will have housing that requires less energy to heat, helping to prevent fuel poverty. Furthermore, when buildings do reach their end of life, they are fully recyclable and the crushed concrete will further absorb carbon dioxide resulting in negative emissions for Wales.

MPA does not disagree with the need to plant trees, but Wales must be careful not to favour one construction material over another. Doing so could damage important Welsh industry and miss benefits that the use of other materials, such as low carbon concrete, could bring in terms of reducing emissions and adapting to climate change. Low carbon concrete will also be important for other priorities including marine energy and drainage and sewerage systems, which are all highlighted as important priorities in the letter.

MPA welcomes the statement that “an important first step to stimulating greater demand is enabling lifecycle analysis of the carbon in a building”, however, this analysis must be a whole life analysis. Focus on the ‘embodied carbon’ in construction materials will miss the emissions or emissions savings associated with the use and end of life of construction materials. A whole life analysis is the only way to get a true picture of emissions and all the information on which to base new policy decisions. As noted above, Wales should remain material neutral when it comes to construction materials and instead set the standards/ targets or outcomes that houses, buildings and infrastructure must meet in terms of whole life emissions. This leaves the construction material producers and designers to select the best materials to meet the required outcomes.

Circular Economy

The letter recognises that 50% of carbon in Wales is embedded in the products and services consumed/ used. Addressing this comes back to the point on consumption emissions made above, and the need to measure and set targets to reduce consumption emissions as well as territorial emissions. However, using alternatives may not be the only answer. Materials that are viewed as high carbon now may be locally produced and able to fully decarbonise in future and there may be no need to switch away. Furthermore, some alternatives that are viewed as sustainable, may not be when emissions are considered across their whole life. Concrete and timber are the prime examples here. Concrete is already locally produced and has the ability to be net negative in future, whilst only 70% of timber has to be sustainably sourced to be certified sustainable. Concrete is long lasting and structures built with it can be reused or repurposed, making it ideal for the circular economy. Around 70% of timber used in construction is imported and at end of life the emissions are released back into the atmosphere, making timber a way of delaying emissions rather than removing them. Wales must remain material neutral and instead strive for all materials to be net zero across their whole life by 2050.

Mineral products make many other important contributions to the circular economy. and support for this would also be welcome from Welsh Government. One example is the use of waste materials which form an important element in the sustainable production of cement by providing fuels and raw materials. The cement manufacturing industry maximises the value

^a https://mineralproducts.org/MPA/media/root/Publications/2020/MPA-UKC-Roadmap-to-Beyond-Net-Zero_Oct20.pdf

from waste materials, especially when compared to disposal to landfill or incineration, including through Energy from Waste facilities, because cement manufacture uses a unique technology known as co-processing:

- The cement industry is able to use waste as an alternative fuel (energy recovery), which reduces the demand on primary fossil fuels - as well as reducing CO₂ and other emissions.
- At the same time, the cement manufacturing process recycles the mineral content of the waste, and solid fuels, as a raw material (material recycling) - thus reducing dependence on virgin raw materials.
- And, because all of the mineral content from the waste is captured in the cement product, there is no residual waste generated by the manufacturing process.

Cement manufacturing therefore provides a positive end use for materials which have reached their end of life and for which no other form of recovery is viable. Given the 'double benefit' of co-processing in a cement kiln, it is important that the Welsh Government recognises that combustion of materials in cement kilns is resource efficient and recycling through both energy recovery and material recycling. The value of this technology option would be lost if a ban on the co-incineration of wastes, which has previously been proposed, included co-processing through cement manufacturing.

Alongside the extraction of primary mineral resources, the mineral products sector also plays an important role in the recovery of construction, demolition and excavation waste to produce recycled materials such as aggregates, along with the use of secondary aggregates comprising waste materials generated from other industrial processes. Both of these contribute towards the circular economy by reducing the demand for primary resources. MPA published two documents on the recycling of Construction, Demolition^b and Excavation Waste^c (CD&EW) in Great Britain, which demonstrate that over 70MT of materials from a range of sources are reused in GB aggregates markets and 90% of these recycled materials are sourced from construction activity following demolition work and road repairs.

The Welsh Government Consultation on the Circular Economy Strategy for Wales (2020) has an aspiration to achieve 90% recycling of construction and demolition waste by 2020. From data collected in the last NRW Construction and Demolition Waste Survey, the preparation for re-use, recycling and other material recovery rate for the Construction and Demolition waste generated in Wales was 87% in 2012. There is no further data available since this study, and it is difficult to see how Welsh Government (WG) can determine progress towards this (or any other) target with no data monitoring programme in place. Regular monitoring data is required to allow progress to be determined, which in turn can help inform whether additional management measures are required.

Transport

MPA members are committed to the decarbonisation of the industry and have a strong track record of pushing for modal shift from road to rail and of meeting new emissions and road

b

https://www.mineralproducts.org/MPA/media/root/Publications/2020/Contribution_of_Recycled_and_Secondary_Materials_to_Total_Aggs_Supply_in_GB_2020.pdf

c

https://www.mineralproducts.org/MPA/media/root/Publications/2019/MPA_Inert_Waste_Feb2019.pdf

safety standards (such as Euro VI in low emission zones). Supporting the industry to progress further, with investment in rail freight and long term support for the infrastructure needed for zero emission HGVs once they are available and suitable for our industry, will be welcome.

The Strategic Road Network would benefit from a less stop-start approach to road building, with the recent pause to projects a major disincentive to suppliers to invest. It also reduces confidence in the Welsh Government as a client, with some impact on investment. Mineral products are critical for delivering a sustainable transport network from the aggregates and coated materials used in road construction, the rail ballast used on the rail network, to the silica sand used to improve the braking efficiency for railway rolling stock making for a more efficient and speedier network.



MPA Wales/Cymru

Delivering for Wales

Priorities for Government . . . Priorities for Industry

Extracting Minerals . . . Manufacturing Products . . . Supplying Markets



Delivering for Wales

[The mineral products and quarrying industry](#) is the largest producer in the UK economy at 400 million tonnes per year. It supplies cement, ready-mixed and precast concrete, lime, asphalt, aggregates, industrial sands and clays, slate and dimension stone to construction and many other industries.

As Wales recovers from the Coronavirus pandemic, adjusts to the post-Brexit world and takes on the net zero challenge whilst delivering net benefit, our industry will continue to supply the essential materials needed to build new homes and infrastructure, and supply strategic and foundation industries including the utilities, manufacturing and agriculture but needs to be supported by the right policies.

The sector produces the majority of the 'heavy' materials critical to the delivery of the Construction Sector Deal and the National Infrastructure Strategy. Transport, energy, water, flood defence and housing all rely upon the supply of mineral products of one type or another. **We are essential to the economy, the operation, development and maintenance of Welsh infrastructure, as well as the built environment and our quality of life.**

In a typical year our members supply more than one million tonnes of mineral resources and products per day across the UK. **Restored quarries provide huge biodiversity benefits for nature, with at least 83km² of priority habitat created by MPA members to date across the UK with much more committed to in the future.** This means that as well as being essential to the economy, infrastructure and the built environment we play a key role in creating net benefit in the natural

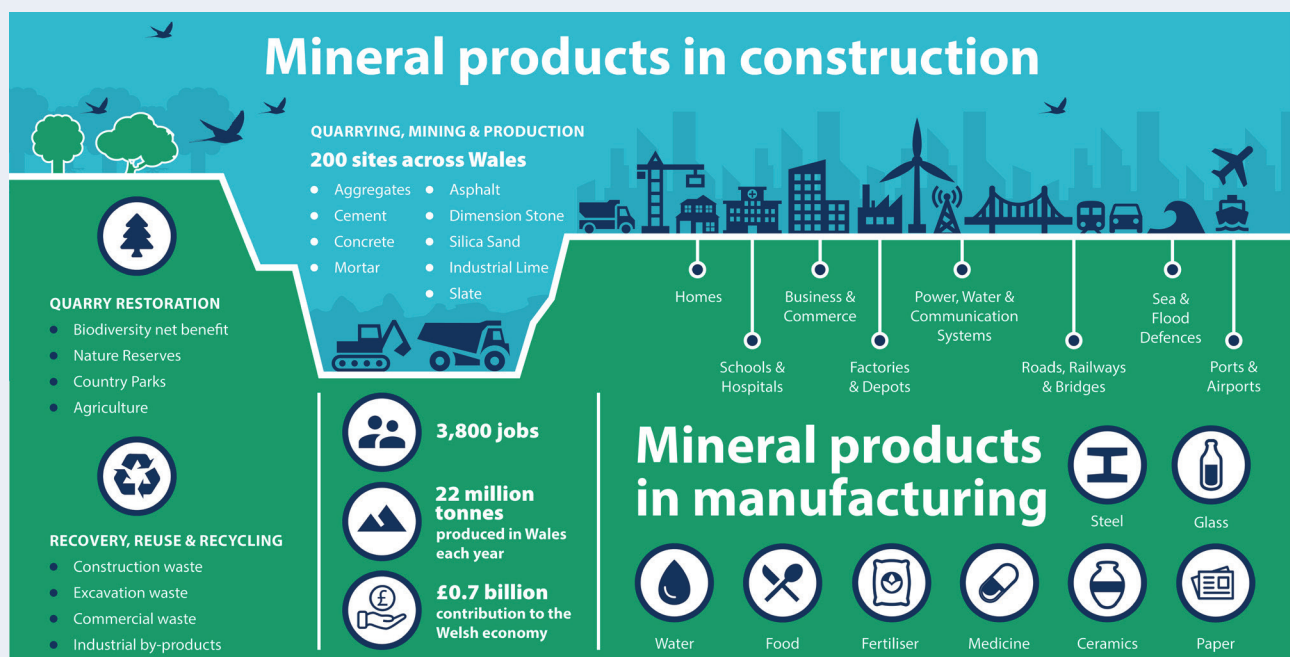
environment and great spaces in which wildlife can thrive and, in many cases, people can connect with nature. Proposals for mandatory biodiversity net benefit need to reflect the real differences between mineral extraction and other development, and not make delivery of the substantial opportunities for nature more difficult.

Mineral products will continue to be essential throughout the economic recovery and critical to growth in the long term. They will be vital to efforts to 'level up' communities, regions and nations, in particular supplying infrastructure projects. **However, the [steady and adequate supply of these materials cannot be assumed.](#)**

Government support for business during the initial stages of the pandemic was vital. MPA members particularly appreciated measures that helped them protect cash flow including the Coronavirus Job Retention Scheme and the VAT deferral. We welcome Government's recognition of the essentiality of our industry, but this recognition must now stimulate policy change by introducing a statement of national need.

The mineral products industry will play its full part in delivering the UK's 2050 net zero commitment. The recently published [Cement and Concrete Industry Roadmap to Beyond Net Zero](#) is an ambitious goal but is achievable with the right support. The industry will continue to be a world leader recycling construction and mineral wastes.

The mineral products industry aims to support and work with the Welsh Government to deliver its agenda. To enable us to do so governments needs to create conditions which minimise uncertainty, build confidence, encourage investment and boost growth.



Extracting Minerals . . . Manufacturing Products . . . Supplying Markets



Priorities for Government to deliver

Supporting business to prosper by:

- Delivering a new post-Brexit economic settlement that keeps Wales competitive and ensures it remains an attractive, reliable investment choice
- Improving the planned delivery of housing and energy and transport infrastructure
- Ensuring education and skills systems provide the workforce with the skills and capabilities required for the modern economy

Supporting industry to decarbonise by:

- Establishing the financial and regulatory support needed for Carbon Capture, Utilisation and Storage (CCUS) in time for industry to invest and make it a reality
- Improving the measurement and understanding of our emissions by using a consumption measure of carbon emissions in order to minimise leakage and creating a level playing field as well as introducing a balanced scorecard for all sectors
- Assessing emissions from buildings over their whole lifetimes
- Supporting the use of biomass and waste biomass in directly fired operations rather than incentivising it to less efficient uses

Strengthening Welsh supply chains by:

- Making the link between all forms of development and the essential mineral product supply chains they rely on and embedding this in policy by introducing a statement of national need
- Prioritising and supporting the indigenous supply of minerals and mineral products, and replenishing reserves, in line with [the UK Minerals Strategy](#)
- Ensuring neutrality between construction methods and materials to deliver sustainable and value-for-money projects
- Adopting procurement policies which support the supply of responsibly sourced construction materials

Enhancing industrial competitiveness by:

- Ensuring a level playing field for UK Energy Intensive Industries with proportionate and competitive energy and carbon taxes
- Maintaining regulatory and quality equivalence with European standards where it protects or advances UK businesses
- Holding imported construction materials to the same environmental standards as domestic production

Making industry taxation fairer and more efficient by:

- Ensuring proportionate and consistent taxation especially on energy costs for industries facing carbon leakage
- Reflecting industry specific taxes such as the Aggregates Levy with adequate policy support for those industries, e.g. properly funding the mineral planning system with a small proportion of the revenue alongside a [Communities Fund](#) to support local communities and the environment

Improving regulation by:

- Properly resourcing the [mineral planning system](#) and the environmental permitting system
- Maintaining existing environmental and technical standards, but implementing regulation more efficiently
- Minimising the cumulative impacts of planning and permitting regulation and avoiding regulatory duplication
- Ensuring land use planning safeguards mineral operations and associated transport facilities



Priorities for Industry to deliver

Improving the sustainability of Welsh supply by:

- Protecting the [health and safety](#) of our workforce and all associated with the industry, including [neighbours and local communities](#)
- Continuing to make full use of [recycled and secondary materials](#), supporting the circular economy
- Contributing to improvements in local air quality, reducing emissions of air pollutants
- Consuming waste as fuel and reducing it in our processes, while increasing recycling and energy efficiency

Providing and enabling solutions for the Wales to deliver net zero by 2050 by:

- Maximising use of alternative fuels including waste biomass, waste-derived fuel and exploring new technology including hydrogen trialling in place of exploring
- Delivering more new products such as low carbon cements and concretes
- Working towards deploying CCUS

Increasing net benefit for biodiversity and nature conservation by:

- Protecting and enhancing biodiversity and nature recovery through land and site management and restoration, including wherever possible, delivering a net benefit for biodiversity, in accordance with the [MPA Biodiversity Strategy](#)

- Extending our knowledge of the biodiversity potential on and adjacent to active sites, and how best to maximise benefits through management, restoration and after-use, through monitoring and sharing of experience
- Sharing best practice between our members and partners through regular events, briefings, and through our Biodiversity & Nature Conservation working group
- Developing our partnerships with conservation organisations, decision makers and individuals to ensure that opportunities to improve biodiversity associated with minerals operations are understood and realised

Meeting future demands for mineral products generated by economic growth and development by:

- Investing in our people to improve skills and competence, improving productivity and broadening awareness of employment opportunities in the sector
- Investing in indigenous mineral resources, manufacturing plant and transport operations
- Contributing to the innovative development of mineral products and evolution of product standards and design codes



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For further MPA information visit www.mineralproducts.org

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MPA Wales/Cymru
Buttermilk Hall, Fron
Garthmyl, Powys SY15 6SA

Tel + 44 (0)1686 640630
Mob 07967 655379
<https://mineralproducts.org/wales>



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