SUPPLEMENTARY INFORMATION

1. Site Details

Site Name:	BMW Works 2 (east side)	Site Address:	BMW GROUP OXFORD, BUILDING 40 ROOFTOP (EAST SIDE), HORSPATH ROAD, COWLEY, OXFORD, OX4 6NJ
National Grid Reference:	455890, 203960		
Site Ref Number:	CS 113048 / VF 13587	Site Type:[1]	Macro – Rooftop

2. Pre-Application Check List

[redacted]

[1] Macro or Micro

[redacted]

Civil Aviation Authority/Secretary of State for Defence/Aerodrome Operator consultation (only required for an application for prior approval)

Will the structure be within 3km of an aerodrome or airfield?	~~Yes~~	**No**
Has the Civil Aviation Authority/Secretary of State for Defence/Aerodrome Operator been notified?	~~Yes~~	**No**
Details of response: N/A		

Developer's Notice

Copy of Developer's Notice enclosed?	**Yes**	~~No~~
Date served:	25/03/2021	
Track & Trace ref:	**BN535946670GB**	

3. Proposed Development

The existing site is at BMW GROUP OXFORD, BUILDING 40 ROOFTOP (EAST SIDE), HORSPATH ROAD, COWLEY, OXFORD, OX4 6NJ

The installation of 2no. new antennas, the installation of 2no. new microwave dishes on 6m support poles, the installation of equipment within the existing cabin, along with ancillary works.

SITE PHOTOGRAPH

Type of Structure:	
Description: THE INSTALLATION OF 2NO. NEW ANTENNAS, THE INSTALLATION OF 2NO. NEW MICROWAVE DISHES ON 6M SUPPORT POLES, THE INSTALLATION OF EQUIPMENT WITHIN THE EXISTING CABIN, ALONG WITH ANCILLARY WORKS.	
Overall Height:	23.7m
Height of existing building	21.1m
Materials *(as applicable):*	
Tower/mast etc – type of material and external colour:	To match existing
Equipment housing – type of material and external colour:	New equipment to be installed within existing equipment cabin.

Reasons for choice of design, making reference to pre-application responses:
Vodafone Limited and Telefonica UK Limited, commonly known as O2 and have entered into a new agreement in which the two companies plan to jointly operate and manage a single network grid across the UK. This initiative strengthens the network infrastructure partnership between the two companies, previously rolled out as part of 'CTIL'. Now a newly formed joint venture company called Cornerstone (Cornerstone Telecommunications Infrastructure Limited) has been formed. Cornerstone is owned equally by the aforementioned operators allowing a single grid infrastructure with both organisations pooling and consolidating their respective networks while running two, independent, nationwide networks. Each operator will keep ownership and control of its network spectrum; however, each operator will have responsibility to manage, maintain and provide coverage in one half of the UK. The overall height of the proposed equipment, including the building, is at 23.7 metres and has been kept to its technical minimum. This height remains the same as the existing equipment whilst allowing for good coverage to the target area. The choice of installing new antennas at the existing site at BMW group Oxford (east side) is considered to be appropriate as it would minimise the visual impact of the development within the locality and is in line with planning policy outlined in Local planning and the NPPF 2012 (Revised February 2019) policies, avoiding the requirement to install additional linear structures. In light of the above and in choosing this particular design, it is considered that the scheme takes a form which is sympathetic within the context of its immediate landscape.

Technical Information

International Commission on Non-Ionizing Radiation Protection Declaration attached (see below) International Commission on Non-Ionizing Radiation Protection public compliance is determined by mathematical calculation and implemented by careful location of antennas, access restrictions and/or barriers and signage as necessary. Members of the public cannot unknowingly enter areas close to the antennas where exposure may exceed the relevant guidelines. When determining compliance, the emissions from all mobile phone network operators on or near to the site are taken into account. In order to minimise interference within its own network and with other radio networks, Vodafone Limited operates its network in such a way the radio frequency power outputs are kept to the lowest levels commensurate with effective service provision	**Yes**	No

As part of Vodafone's network, the radio base station that is the subject of this application will be configured to operate in this way. All operators of radio transmitters are under a legal obligation to operate those transmitters in accordance with the conditions of their licence. Operation of the transmitter in accordance with the conditions of the licence fulfils the legal obligations in respect of interference to other radio systems, other electrical equipment, instrumentation or air traffic systems. The conditions of the licence are mandated by Ofcom, an agency of national government, who are responsible for the regulation of the civilian radio spectrum. The remit of Ofcom also includes investigation and remedy of any reported significant interference. The telecommunications infrastructure the subject of this application accords with all relevant legislation and as such will not cause significant and irremediable interference with other electrical equipment, air traffic services or instrumentation operated in the national interest.		

4. Technical Justification

Reason(s) why site required e.g. coverage, upgrade, capacity

A base station site upgrade is required in this location in order to provide network coverage, as well as catering for future networks demands for both Vodafone and Telefonica, commonly known as O2, to this area in Oxford.

Base stations use radio signals to connect mobile devices and phones to the network, enabling people to send and receive calls, texts, emails, pictures, web, TV and downloads. Without base stations, mobiles will not work. They are made up of three main elements. The cabinets, which contain the equipment, used to generate the radio signal. The supporting structure such as a mast, which holds the antennas in the air and the antennas themselves. Only the antennas emit radio signals.

Many other everyday items also use radio signals to send and receive information, such as television and radio broadcasting equipment and two-way radio communications. Base stations are connected to each other and telephone exchanges by cables or wireless technology such as microwave dishes, to create a network. The area each base station covers is called a cell. Each cell overlaps with its neighbouring cells to create a continuous network. The size and shape of each cell is determined by the features of the surrounding area, such as buildings, trees and hills, which can block signals. When people travel between cells, the signal is transferred between base stations without a break in service. Each base station covers a certain area only and can only handle a limited number of calls at once. As mobile phones and devices become more popular more base stations are needed to ensure continuous coverage.

Vodafone and Telefonica are both Electronic Communications Code Systems Operators licensed under the terms the Communications Act 2003 to provide mobile personal communications networks in the UK. In order to improve the level of service it provides for their customers in line with its licence requirements, both companies are constantly developing their networks, as well as refining and modernising their equipment. Given the dynamic and constantly evolving nature of technological advances in telecommunications products, coupled with the demands on operators from subscribers to provide new and better-quality services, this dictates a continual reinvestment programme in the infrastructure behind the use of mobile devices. Operators are currently involved in developing sites to provide coverage to areas which have not benefited from access to the full services they offer and to areas of their existing network where increased or improved service quality is required.

Due to the dramatic rise in the use of mobile data, the industry has had to consider new operating models that are efficient at delivering services to a much larger percentage of the UK's population. As previously discussed, both companies will pool their basic network infrastructure, while running two, independent, nationwide networks. By doing this, they will both reach far more of the country far faster than they could achieve on their own. This single network grid will automatically increase each operator's footprint by 40%, adding competition and choice for customers in areas that previously only had one operator's coverage available. Further detail regarding the general operation of the network can be found in the accompanying document entitled 'General Background Information for Telecommunications Development'. This information is provided to assist the local planning authority in understanding any technical constraints on the location of the proposed development.

5. Site Selection Process

Alternatives sites considered but not selected:

If no alternative site options have been investigated, please explain why:

This IS an upgrade of an existing rooftop telecommunications site. Integration with existing network.

Additional relevant information (include planning policy and material considerations):

House of Commons: Written Statement (HCWS631): Boosting Mobile Connectivity (17 March 2016)

The written statement outlined the Government's commitment to improving mobile connectivity; "The Government is firmly committed to ensuring there is sufficient capacity to meet the growing demand for mobile connectivity…" "This Government intends to bring forward provisions in England to provide greater freedoms and flexibilities for the deployment of mobile infrastructure…"

The above confirms the Government's commitment to good and improved communications. Recognising the vital importance of mobile connectivity for residents and local economies, the urgent delivery of the required network improvements continues to be a Government priority.

This proposal assists in meeting this objective.

The Digital Economy Act (2017)

The new Digital Economy Act (2017) and the new Electronic Communications Code (2017) came into force to enable access to fast digital communication services by citizens and businesses, to shape the emerging digital world for consumers and businesses, and to support the delivery of better public services for citizens by the government. The above legislations reflect the government's vision towards developing digital infrastructure in the country and should therefore, be given appropriate weight in decision-making.

Planning Policies

Local Plan Policy

As outlined in Oxford City Council's website:

The Oxford Local Plan 2036 was adopted in June 2020 and now forms part of the statutory development plan, which means that it will have full weight in determining planning applications.

The statutory Development Plan for Oxford consists of the Local Plan 2036, site specific Area Action Plans and made Neighbourhood Development Plans.

The relevant information and planning policies found within these documents for this proposal are:

Policy V7: Infrastructure and cultural and community facilities:

8.33 The City Council will seek to ensure that all new development, and wherever possible all residents and businesses, have access to full-fibre speeds of internet connectivity. Oxford's strengths in the knowledge economy (see Chapter 2: Economy) provide a real opportunity for it to drive forward the research, testing and development of digital technologies. Partners in the academic, research, technology and public sectors have come together as Smart Oxford, a strategic programme to develop and promote Oxford as a smart city. The aim of Smart Oxford is to provide a test bed for world class researchers and innovators which will generate growth and jobs to advance economic and social prosperity, and help improve the quality, effectiveness, and efficiency of city services. The City Council recognises this as a rare opportunity to both support an emerging market sector and to secure benefits on the ground for the city's residents and businesses.

Policy V8: Utilities:

8 .34 Digital Infrastructure comprises physical telecommunications components such as fixed broadband and mobile connectivity, which improves the lives of citizens and business productivity. The NPPF, Future Telecoms Infrastructure Review (FTIR), and other policy documents issued by Building Digital UK (BDUK), all refer to the importance of high-quality digital infrastructure to the UK economy.

8 .35 Delivery of full fibre broadband infrastructure, as well as mobile infrastructure including 5G, is a priority to achieve the government's targets set out in the FTIR. The council recognises the importance of this and has implemented a range of complementary initiatives aimed at achieving government targets for full fibre and 5G coverage. This

includes setting up a digital infrastructure partnership with all Oxfordshire district councils as well as Oxfordshire County Council. This partnership collectively agrees under a Memorandum of Understanding to collaborate on all aspects of digital infrastructure delivery and attracting commercial operators to invest in building digital infrastructure both in the city and the county as a whole.

National Planning Policy Framework

The National Planning Policy Framework – February 2019 - sets out the Government's planning policies for England and how these should be applied. It provides a framework within which locally prepared plans for housing and other development can be produced.

This includes supporting high quality communications stating that;

112. Advanced, high quality and reliable communications infrastructure is essential for economic growth and social well-being. Planning policies and decisions should support the expansion of electronic communications networks, including next generation mobile technology (such as 5G) and full fibre broadband connections. Policies should set out how high-quality digital infrastructure, providing access to services from a range of providers, is expected to be delivered and upgraded over time; and should prioritise full fibre connections to existing and new developments (as these connections will, in almost all cases, provide the optimum solution).

113. The number of radio and electronic communications masts, and the sites for such installations, should be kept to a minimum consistent with the needs of consumers, the efficient operation of the network and providing reasonable capacity for future expansion. Use of existing masts, buildings and other structures for new electronic communications capability (including wireless) should be encouraged. Where new sites are required (such as for new 5G networks, or for connected transport and smart city applications), equipment should be sympathetically designed and camouflaged where appropriate.

114. Local planning authorities should not impose a ban on new electronic communications development in certain areas, impose blanket Article 4 directions over a wide area or a wide range of electronic communications development, or insist on minimum distances between new electronic communications development and existing development. They should ensure that: a) they have evidence to demonstrate that electronic communications infrastructure is not expected to cause significant and irremediable interference with other electrical equipment, air traffic services or instrumentation operated in the national interest; and b) they have considered the possibility of the construction of new buildings or other structures interfering with broadcast and electronic communications services.

115. Applications for electronic communications development (including applications for prior approval under the General Permitted Development Order) should be supported by the necessary evidence to justify the proposed development. This should include:

a) the outcome of consultations with organisations with an interest in the proposed development, in particular with the relevant body where a mast is to be installed near a school or college, or within a statutory safeguarding zone surrounding an aerodrome, technical site or military explosives storage area; and

b) for an addition to an existing mast or base station, a statement that self-certifies that the cumulative exposure, when operational, will not exceed International Commission guidelines on non-ionising radiation protection; or

c) for a new mast or base station, evidence that the applicant has explored the possibility of erecting antennas on an existing building, mast or other structure and a statement that self-certifies that, when operational, International Commission guidelines will be met.

116. Local planning authorities must determine applications on planning grounds only. They should not seek to prevent competition between different operators, question the need for an electronic communications system, or set health safeguards different from the International Commission guidelines for public exposure.

It is considered the proposed development complies with the broad aims of the NPPF. It assists in the aim to keep the number of installations to a minimum, with two operators achieving coverage for multiple networks from a single lattice structure. The equipment has been sympathetically designed with the height kept to a minimum and it would enhance the provision of local community facilities and services.

Code of Best Practice on Mobile Network Development (CoBP) 2016

The CoBP recommends a sequential approach to siting telecommunications apparatus; - Mast or site sharing – This is an upgrade of an existing base station - Installation on existing buildings and structures – Existing base station on an existing structure - Camouflaging or disguising equipment - Using small scale equipment - Erecting new ground-based masts

As part of the Telefonica and Vodafone's continued network improvement program, there is a specific requirement for this radio base station development to provide improved network services to the area using the latest technology, including the provision of new 3/4G & 5G mobile connectivity. This proposal will provide for improved communications services, whilst keeping visual impact to a minimum.

Fixing the Foundations: Creating a more prosperous Nation (HM Treasury) – July 2015

The Government's objectives and proposals relating to the encouragement of improved connectivity are detailed in Chapter 7. The objectives are outlined in the section titled "Long Term Investment" and states;

"7. World-Class digital Infrastructure in every part of the UK

Our digital infrastructure is improving fast but there are still too many businesses hampered by slow connections, and households who cannot play their full part in the digital economy. The Government will;
• Ensure superfast broadband (at least 24Mbps) is available to 95% of UK households and businesses by 2017; the government's superfast broadband programme is passing an additional 40,000 premises every week. • Support the market to deliver near universal 4G and ultrafast broadband coverage (at least 100Mbps)
• Make it easier for the market to roll out the fixed and mobile infrastructure the UK needs, including through proposals to reform planning rules on taller mobile masts"

Planning Assessment

As mentioned previously, it is considered that the proposed rooftop telecommunications infrastructure is in line with the planning policies above and will avoid the installation of an additional linear structure, (or structures).

In light of the above and with bearing in mind the height and location of this building at BMW group Oxford, it is considered that the upgrade proposal would not be overly intrusive in the locality and its visual impact and would not outweigh the continued need and future demands to provide coverage to this area of Oxford. It is evident that the proposed development adheres to the above local and national planning policy. First of all, the proposal includes sharing of telecoms infrastructure and proposes the upgrade of existing telecommunications infrastructure.

Secondly, it would not have a significantly adverse effect on the character and visual amenities of the locality. The fact that the installation will be visible at point in the surrounding area, does not itself demonstrate that the proposal will cause unacceptable harm to the visual amenity of locality. An ICNIRP Declaration has been submitted with this application.

Contact Details

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Signed:	[redacted]	Date:	25/03/2021
Position:	Planner	Company: (on behalf of Cornerstone and above operator)	Maxema Limited