



Medway Authority Monitoring Report 2017

Volume 3 - Local Aggregate Assessment 2016

December 2017

1. Executive Summary

- 1.1. This is the fifth Local Aggregate Assessment (LAA) produced for Medway, in line with the requirements set out in the National Planning Policy Framework (NPPF) and in the National Planning Practice Guidance (NPPG). The report covers the 2016 calendar year and is circulated to minerals planning authorities throughout the South East and neighbouring areas, industry representatives and other key stakeholders. It has been formally considered by the South East England Aggregates Working Party (SEEAWP) for its technical advice and views on how Medway is contributing to wider regional needs. Following consultation, the council has published the final version of the LAA with its Annual Monitoring Report at the end of 2017.
- 1.2. The council has had regard to a range of data sources in compiling information on the demand for aggregates and supply options available; with the annual aggregate monitoring produced by SEEAWP based on a survey of local operators being a key source of data. Due to the size of Medway, and the limited number of minerals sites and wharves, there have previously been areas where it was difficult to publish sales data due to commercial confidentiality. Following discussions with the operators in 2017, an agreement has now been made as to a means of publishing most collated sales data. A summary table for the aggregates supply in 2016 can be found in appendix A.

Supply

- 1.3. Aggregate supply in Medway is from four main sources: land won resources; marine-dredged aggregates, imported resources and recycled and secondary aggregates. Due to the size and nature of the geology in Medway, the only land won aggregates currently extracted in the district are sharp sand and gravel.
- 1.4. Aggregate supply is also restricted by Medway's environment. A total of 45% of Medway's area falls within environmental designations, including sites of importance at European level.
- 1.5. There are two sites presently in Medway with the potential to provide land won sharp sand and gravel, with a total permitted reserve of 1.31Mt. This reserve has been used to calculate the landbank, which currently stands at 218 years, based on a 10-year sales average. This is significantly above the 7-year landbank required for sharp sand and gravel in the NPPF.
- 1.6. Medway has 3 active wharves that supply marine dredged aggregates (soft sand, sharp sand and gravel) and the importation of crushed rock. These resources make up a significant proportion of the aggregates supplied in the district and the south-east

region. In 2016 Kent and Medway combined imported 93% of the crushed rock and 53% of the marine dredged aggregates to the region. The Medway wharves reported an increase in 2016 from 2015 levels in both the importation of crushed rock and marine dredged materials – this is a trend seen across the south east region.

- 1.7. Medway also has several sites that have the potential to supply recycled and secondary aggregates to the market. Sales of recycled and secondary aggregates have increased 109% between 2015 and 2016, to 0.06Mt.
- 1.8. In the past other minerals such as clay, chalk and brickearth have also been extracted in the area. There is an abundance of both chalk and clay in the region; however recent demand for the extraction of these minerals in Medway has been limited.

Demand

- 1.9. Government guidance on the LAA in the NPPG advises local authorities to use an average of 10 years' and 3 years' land won sales data to calculate demand over the long and short term.
- 1.10. Based on the guidance outlined in the NPPG for land won sand and gravel a 10-year sales average has been calculated. The 10-year average sales data shows present demand at 0.006Mtpa for sharp sand and gravel. This relatively low output is reinforced by the 3-year sales average of 0.003Mt. Therefore overall the demand appears to be very low for land won resources in Medway, with alternative sources of supply being of continued importance.
- 1.11. Medway's contribution to aggregates planning and supply is particularly significant in the importation of marine dredged aggregates and crushed rock, as outlined above in paragraph 1.6.
- 1.12. The Council has also analysed several external sources to project any trends that may be emerging that would influence demand. The population of Medway is predicted to increase 18% by 2035. Furthermore, house builders are reporting increased workloads and planning permissions granted nationally indicate a potential increase in demand over the coming years. A number of significantly large regional infrastructure projects (such as Cross Rail 2 and HS2) are also expected to significantly increase demand.

2. Introduction

- 2.1. This is the fifth LAA produced for Medway. It has been prepared in line with requirements set out in the NPPF (Paragraph 145) and the NPPG. Paragraph 145 of the NPPF states Minerals Planning Authorities should prepare: *‘an annual Local Aggregate Assessment, either individually or jointly by agreement with another or other minerals planning authorities, based on rolling average of 10 years sales data and other relevant local information, and an assessment of all supply options (including marine dredged, recycled and secondary sources)’*. This then needs to be submitted to the regional Aggregate Working Party and through this to the National Aggregate Coordinating Group. The national group will then consider whether the totals provided by the area Aggregate Working Parties make appropriate provision to maintain a steady and adequate supply of aggregate. This process seeks to ensure the coordination of minerals planning at a strategic level.
- 2.2. This LAA has an important role in the coordination of planning for the steady and adequate supply of minerals to meet the country’s needs. Aggregate minerals such as soft sand, sharp sand and gravel and crushed rock are used as construction materials, and therefore are intrinsic to the nation’s development, maintaining infrastructure and supporting economic growth.

Development of LAA – Collaboration and Coordination

- 2.3. Medway Council is a member of SEEAWP which represents each Minerals Planning Authority in the former South East region, along with the Marine Management Organisation, the Crown Estate, British Aggregates Association, Mineral Products Association and operators from the aggregates industry. SEEAWP is central to ensuring the coordination of minerals planning at a strategic level across the south east, and providing a link to the national level through the National Aggregate Coordinating Group. SEEAWP has specific responsibility to:
- Provide technical advice to Mineral Planning Authorities on the adequacy of each local aggregate assessment.
 - Provide an assessment of the position of overall demand and supply for the AWP area, including, whether, in its view, the area is making a full contribution towards meeting both national and local needs. This should include an indication of emerging trends of demand in the AWP area.
 - Obtain, collect and report on data on minerals activity in the area. This includes annual data on sales, permissions and mineral reserves in their area, recycled and secondary sources and use this information to produce an annual report on these issues.

- 2.4. In drafting this LAA, Medway Council has used a wide range of available information to assess the current position for aggregates planning in Medway. This has included reference to the SEEAWP South-East England Aggregates Monitoring 2016 report for information on regional context and trends, plus returns from the minerals industry and national statistics.
- 2.5. Medway as a unitary authority recognises the particular importance in coordinating its minerals planning work, including the production of the LAA, with its neighbouring Minerals Planning Authority, Kent County Council. The two councils have liaised in the development of their respective LAAs, and have worked together for a number of years in the collation of evidence to support minerals planning.
- 2.6. Due to the size of Medway, and the limited number of minerals sites and wharves, some sources of data are restricted, and cannot be disaggregated to a Medway level, for reasons of commercial confidentiality and agreements made with industry. Following discussions with the operators in 2017, an agreement has now been made as to a means of publishing most collated sales data. This is reflected in how and what data is presented in this report.

Consultation

- 2.7. The Localism Act 2011 also introduced the duty to cooperate into the planning system. This is a legal duty whereby planning authorities must ensure that consultation is undertaken that is both active and constructive throughout the plan making process on strategic and cross boundary matters. The provision and supply of minerals is one of the issues covered by this process.
- 2.8. In accordance with the duty to cooperate this report has been drawn up in liaison with Kent County Council's minerals planning service and industry operators. To ensure that the LAA makes appropriate reference to the wider regional context, Medway Council sought comments from Minerals Planning Authorities across the region and industry representatives through the SEEAWP.

Geology

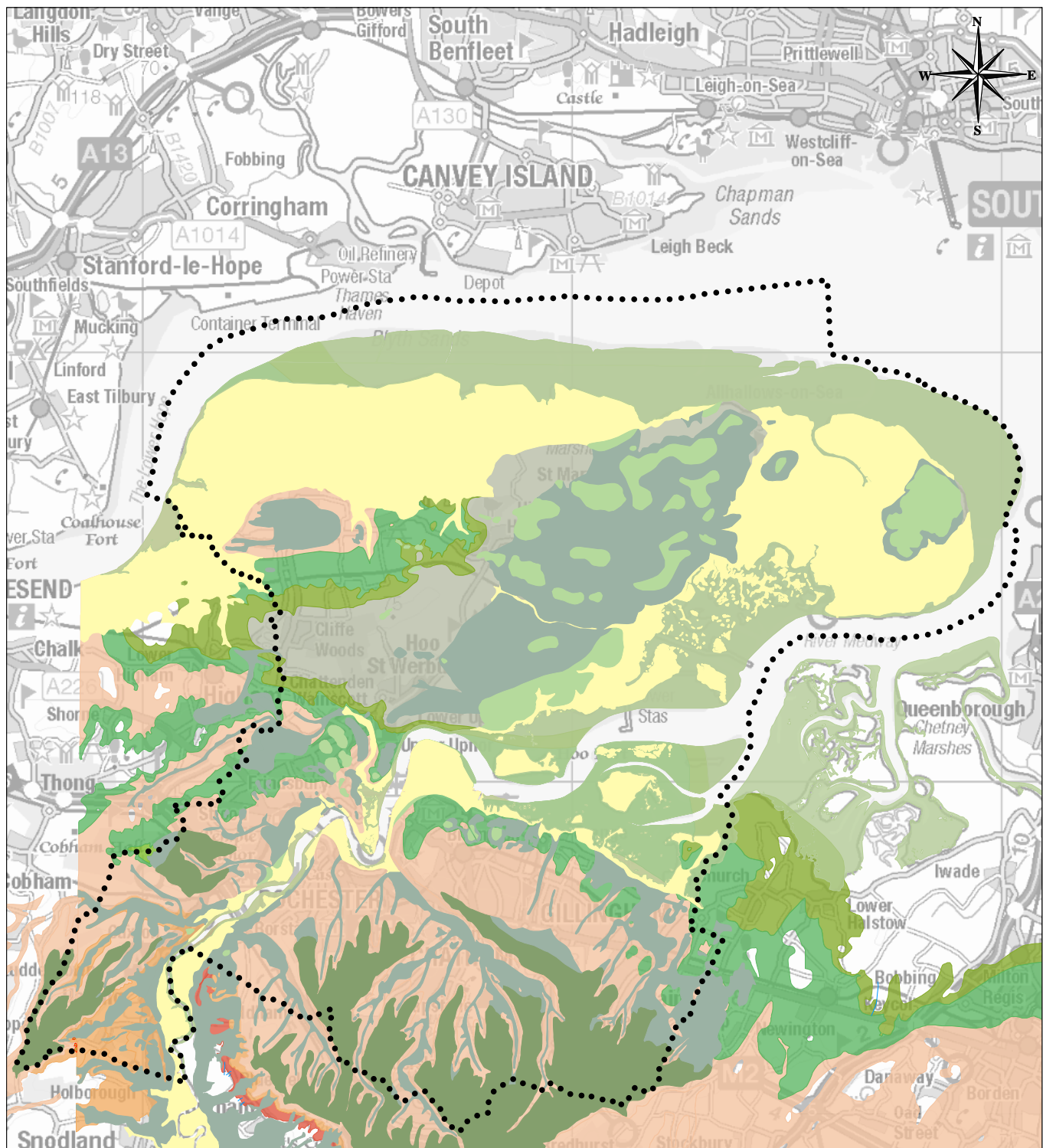
- 2.9. The sand and gravel deposits in the Medway area are primarily concentrated on the Hoo Peninsula as a result of post-glacial melt water outwash deposition found in a series of 'river terraces', trending roughly from north west to south east across the peninsula's ridge, and on the Isle of Grain. There are also more recent water-lain deposits covering areas of land on the eastern and north-western marshes of the peninsula that include some sand and gravel seams. The deposits have not been significantly reworked by natural processes since their deposition, and have a sand to gravel ratio and particle characteristics that makes them generally attractive for high

specification value added concrete production. An overview of Medway's geology is provided in Figure 1.

- 2.10. Information arising from research to support minerals planning in Kent and Medway, together with borehole survey data provided by minerals companies, have been used to determine 'Areas of Search' for minerals allocations in development plans. Total proven aggregate mineral resources, including the defined 'Areas of Search' over the Medway area are calculated to be 1,640,000 tonnes. The total potential (proven and unproven) river terrace sand and gravel reserves in the unconstrained areas of the Hoo Peninsula are assessed as being in a range from 3,345,326 tonnes to 4,547,940 tonnes. This is considered to provide sufficient potential to meet the area's needs.

Environmental Designations

- 2.11. Medway covers an area of 26,886ha (including rivers and coastal areas) but within this area are numerous environmental designations that could constrain where minerals extraction could take place. These designations include: Special Protection Areas (SPA), Ramsar sites, Special Areas of Conservation (SAC), Areas of Outstanding Natural Beauty (AONB), Sites of Special Scientific Interest (SSSI), Marine Conservation Zones (MCZ), National Nature Reserves (NNR) and Local Nature Reserves (LNR); covering a total area of 12,180ha, or 45% of Medway's area. The extents of the environmental designations in Medway are provided in Figure 2.



| Superficial geology | | Bedrock geology | |
|---|-------------------------------------|-------------------------------|------------------------------------|
| Well Hill gravel | Clay with flints | Thanet Sand Formation | Bagshot formation |
| Chelsfield gravel | Dartford/Silt/Ilford Silt formation | Thanet Sand - Bullhead Bed | Lambeth Group |
| Kempton Park gravel formation | | Harwich formation | Folkestone formation |
| Boyn Hill gravel formation | | London Clay formation | Lewes Nodular Chalk formation |
| Alluvium | | Lewes Nodular Chalk formation | West Melbury Marly Chalk Formation |
| Taplow gravel formation | | London Clay - Claygate Member | Zig Zag Chalk Formation |
| Black Park gravel formation | | Gault formation | |
| Head (undifferentiated) | | Chalk | |
| River Terrace Deposits (undifferentiated) | | Melbourne Rock | |
| Peat | | Lenham formation | |

Figure 1: Medway's geology



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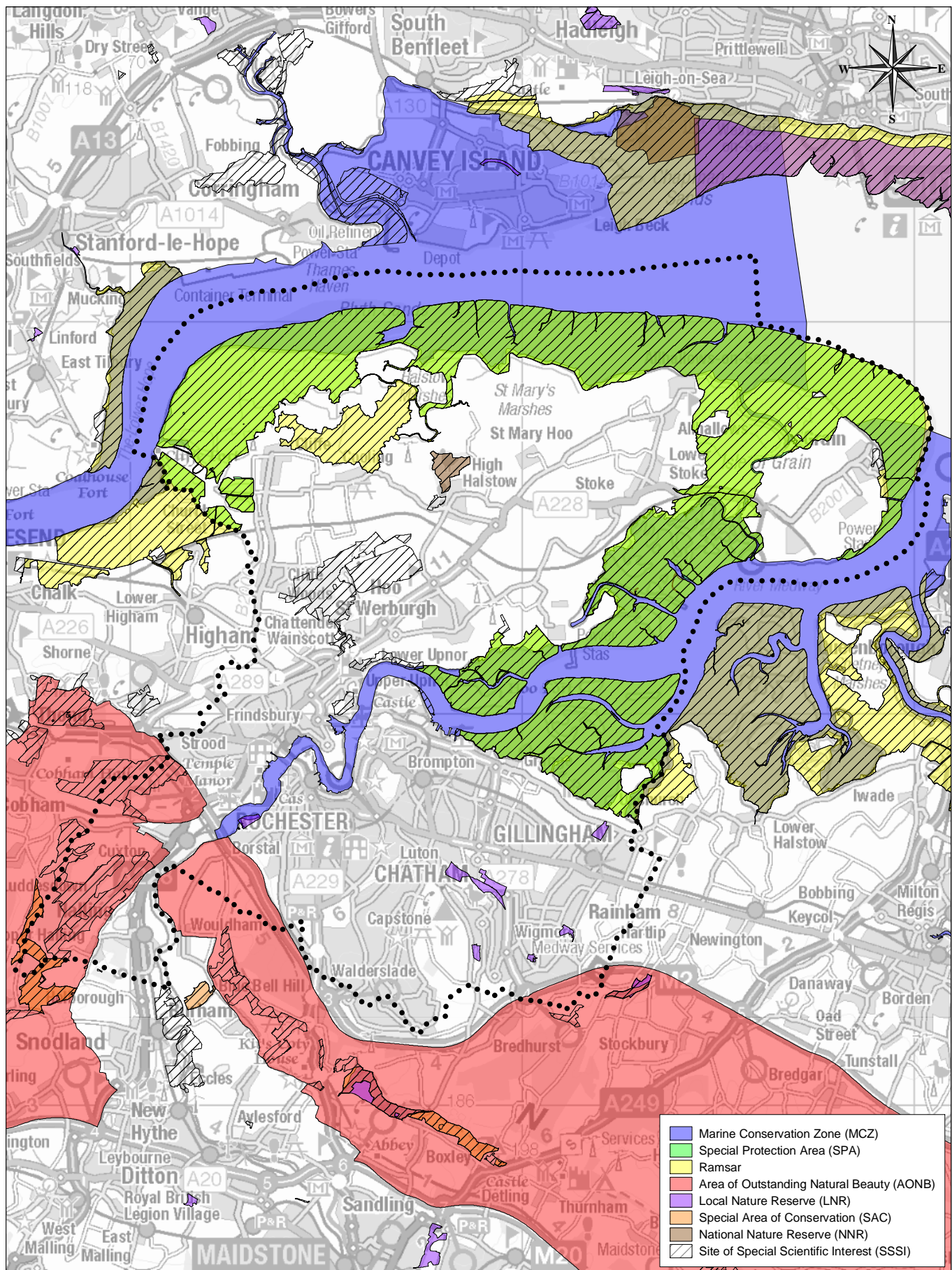


Figure 2: Environmental designations in Medway



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3. Wharves and Rail Depots

3.1. Medway makes a critical contribution to the south east's infrastructure for the importation of aggregates, particularly marine dredged soft sand, sharp sand and gravel. The scale of the importation makes Medway's wharves of regional and national significance. There are three currently in operation:

- Grain Terminal, Isle of Grain: operated by Aggregate Industries.
- North Sea Terminal, Cliffe, Rochester: operated by Brett Aggregates.
- Euro Wharf, Frindsbury, Rochester: operated by Hanson Aggregates.

3.2. Together these three sites make a significant contribution to the importation of minerals into the region. Medway's wharves are amongst the largest in Kent and Medway, and have the greatest capacity. The wharves are operating within their capacity levels which offer the ability to increase production in response to market demand.

3.3. Two of the wharves have associated rail depots (one of which is located outside of Medway), both of which provide valuable infrastructure for the distribution of aggregates to the wider south east region.

3.4. Due to commercial confidentiality, sales from the rail depots cannot be broken down other than by a 3-year and 10-year sales average. Table 1 sets out the 3-year average sales of crushed rock through rail depots. The sales data for rail depots starts from 2013 when sales returns began to be received; therefore the information available through the average sales figures is limited.

Crushed Rock

3.5. Consideration of this supply stream shows the importance of Medway's wharves in the importation of aggregates and their supply into markets in Kent, London and the wider southeast region. Importation of crushed rock (granite) comes from Glensanda in Scotland, and limestone from Torr Works in Somerset.

3.6. Glensanda quarry has planning permission for the extraction of minerals until 2043, and Somerset County Council have confirmed that there are sufficient reserves at the Torr Works to meet current and future needs; providing a great deal of certainty for supply to the region. The level of crushed rock sales through Medway's wharves is set out in Table 1.

Table 1: Sales of crushed rock through wharves and rail depots in Medway

| | 3-yr average sales (Mt): Rail depots | Annual sales (Mt): Wharves | 3-yr average sales (Mt): Wharves | 10-yr average sales (Mt): Wharves |
|------|--------------------------------------|----------------------------|----------------------------------|-----------------------------------|
| 2012 | N/A | 0.76 | 0.83 | N/A |
| 2013 | N/A | 0.86 | 0.82 | N/A |
| 2014 | N/A | 0.77 | 0.80 | N/A |
| 2015 | 0.06 | 1.09 | 0.91 | 1.01 |
| 2016 | 0.03 | 0.91 | 0.92 | 0.98 |

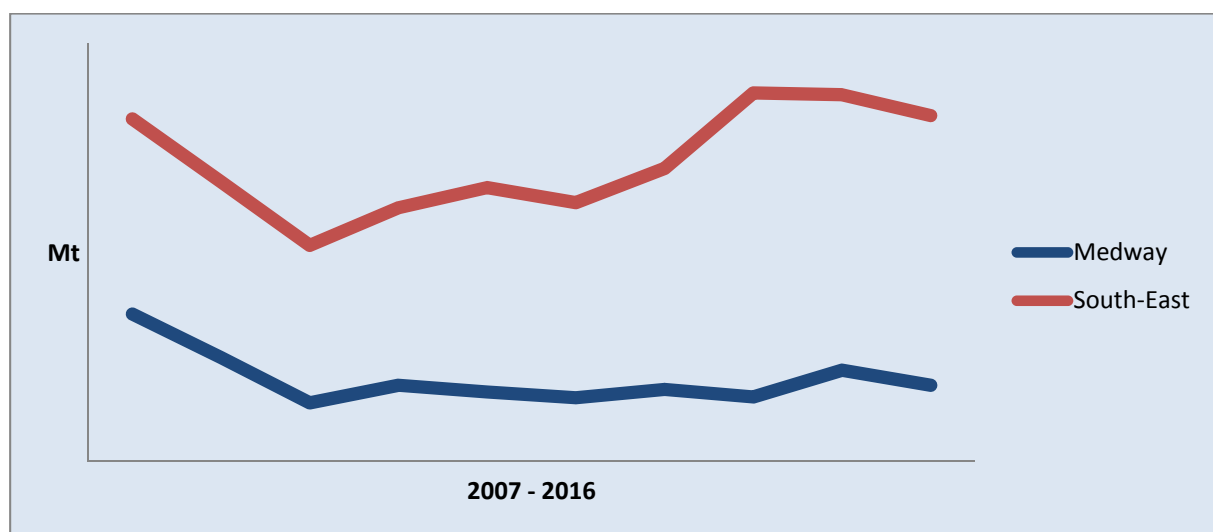
3.7. The Aggregate Monitoring report 2016 produced by SEEAWP provides an overview of the regional position on the importation of crushed rock. Landings of crushed rock in 2016 at just under 2.6Mt increased the level of landings compared to 2015. Table 2 provides a breakdown of the sales (Mt) of imported crushed rock, including through rail depots.

Table 2: Sales of crushed rock through wharves and rail depots in the South-East region

| | Annual sales (Mt): Rail depots | 3-yr average sales (Mt): Rail depots | Annual sales (Mt): Wharves | 3-yr average sales (Mt): Wharves |
|------|--------------------------------|--------------------------------------|----------------------------|----------------------------------|
| 2012 | 3.09 | 3.13 | 1.48 | 1.77 |
| 2013 | 3.51 | 3.30 | 1.53 | 1.65 |
| 2014 | 4.06 | 3.67 | 1.47 | 1.49 |
| 2015 | 4.04 | 4.09 | 2.18 | 1.73 |
| 2016 | 3.74 | 4.30 | 2.60 | 2.08 |

3.8. When the regional and the local trends are compared the sales of crush rock through wharves is relatively similar (see Figure 3 below). Medway therefore is in-line with the regional trends outlined in the SEEWAP figures.

Figure 3: Comparative sales trend of crushed rock through wharves in Medway and the South-East region 2007 to 2016



Marine-won Soft Sand, Sharp Sand and Gravel

- 3.9. This supply stream is of particular importance for Medway, due to the quantities of materials landed at the area's wharves. The location of the large wharves on the rivers Medway and Thames provides good access to the three licensed dredging grounds of the Thames Estuary, East Coast and East English Channel. These wharves are also well placed for onward transport of materials to markets locally, in London and the wider southeast region.
- 3.10. The South East Aggregate Monitoring report for 2014/15 noted that certain minerals planning authorities have soft sand supply issues partly because of landscape constraints. The report also notes how the location of the soft sand resources within protected landscapes might make it increasingly difficult to find reserves in certain areas and thereby maintain land-won supplies at historic levels. Furthermore, it is anticipated that the demand for soft sand in the South East will increasingly need to be met by imports into the area and from marine won sources. To help provide a more detailed analysis of soft sand supply, sales figures of marine-won soft sand will now be separated out from (sharp) sand and gravel sales figures for 2016 onwards.
- 3.11. Landings of marine-won soft sand, sharp sand and gravel into Kent and Medway wharves in 2016 accounted for over 53% of all marine-won sand and gravel landed in the south east, excluding London.
- 3.12. The level of marine-won soft sand, sand and gravel sales (Mt) at wharves in Medway is shown in Table 3 below. For soft sand the level of sales in 2016 of was 0.21Mt, which was 105% above the previous years' sales and shows an increase of 0.11Mt (115%) from 2015 to 2016.
- 3.13. For sharp sand and gravel the level of sales in 2016 of was 1.98Mt, which was 15% above the 3 year sales average and 72% above the 10 year sales average and shows an increase of 0.38Mt (24%) from 2015 to 2016.

Table 3: Annual sales of Soft Sand and Sharp Sand and Gravel through wharves in Medway

| | Annual sales (Mt): Sharp Sand and Gravel | 3-yr average sales (Mt): Sharp sand and gravel | Annual Sales (Mt): Soft Sand | 3-yr average sales (Mt): Soft Sand | Annual sales (Mt): All sand and gravel | 3-yr average sales (Mt): All sand and gravel |
|-------------|---|---|---|---|---|---|
| 2012 | 1.21 | 1.18 | 0 | 0.001 | 1.21 | 1.18 |
| 2013 | 1.40 | 1.26 | 0 | 0 | 1.40 | 1.26 |
| 2014 | 1.59 | 1.40 | 0 | 0 | 1.59 | 1.40 |
| 2015 | 1.60 | 1.53 | 0.09 | 0.03 | 1.69 | 1.56 |
| 2016 | 1.98 | 1.72 | 0.21 | 0.10 | 2.18 | 1.82 |

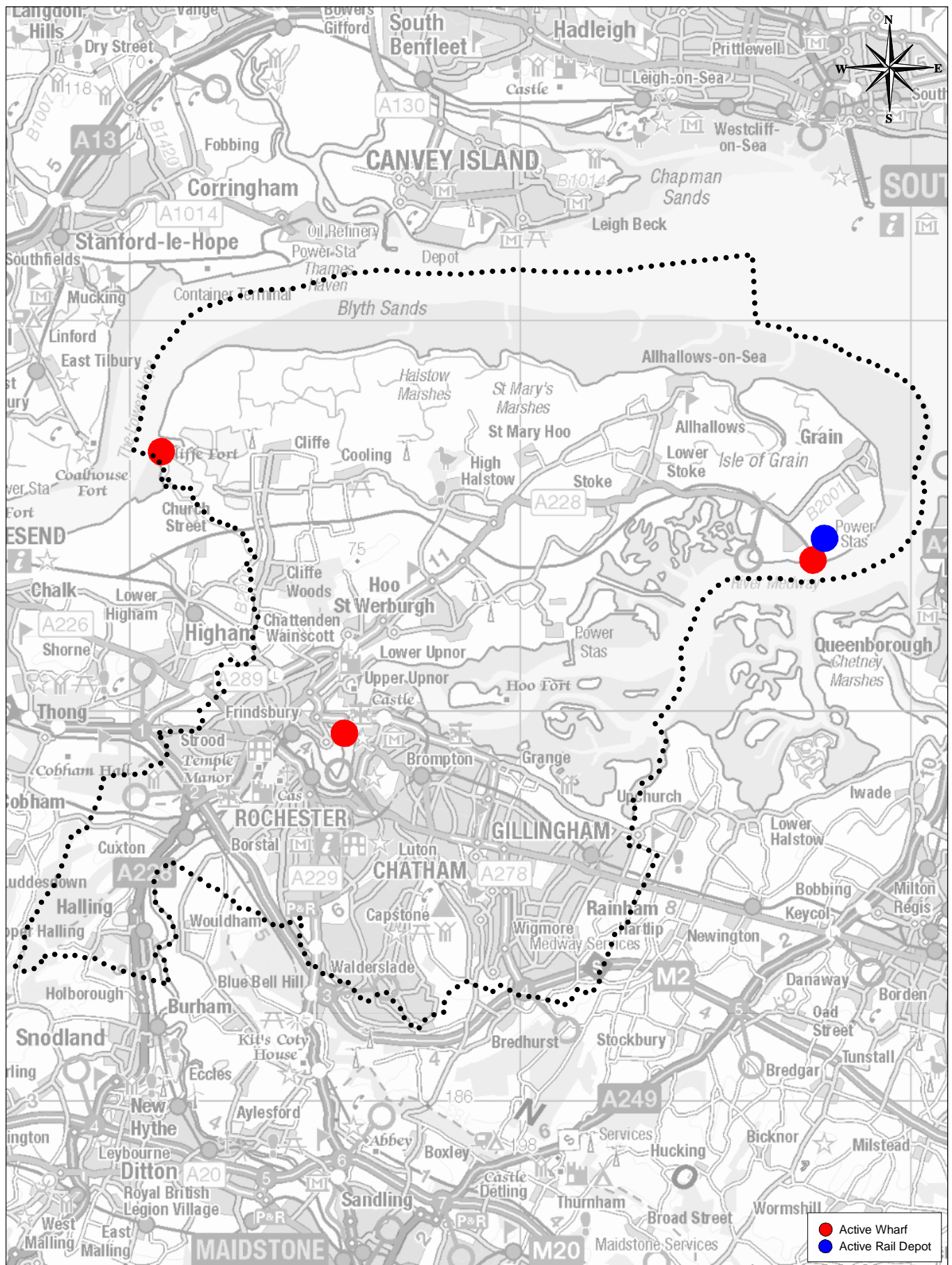


Figure 4: Active Wharves and Rail Depots in Medway



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4. Land-won Resources

- 4.1. Medway has deposits of sand and gravel, chalk, clay and brickearth with quarrying predominantly taking place across the Hoo Peninsula in the past, but there have only been limited operations in recent years for the extraction of sand and gravel.
- 4.2. The present permitted reserve of sand and gravel is 1.31Mt. This is derived from Kingsnorth Quarry to the south east of the village of Hoo St Werburgh, and a small remaining reserve at Perry's Farm, Grain.
- 4.3. Kingsnorth Quarry has planning consent for the extraction of 1,195,000 tonnes of sand and gravel. The plan is to extract minerals in phases at a rate of approximately 120,000 tonnes a year, over 10 years. It is understood that the planning permission (previously due to expire in May 2017) is currently being implemented.
- 4.4. Research carried out to support mineral planning work in Kent and Medway has provided an indication of further available reserves in the area. As set out earlier in this report, information on potential reserves indicates that there is sufficient potential resource for further allocations to meet needs over the emerging Local Plan period.
- 4.5. Due to the limited number of quarrying sites in Medway, it has not been previously possible to publish annual levels of sales of locally won sand and gravel. However the council has been able to use data provided to the annual Aggregates Monitoring survey to produce a 3-year and 10-year average sales figure.
- 4.6. The 10-year average sales for aggregates from quarries in Medway are 0.006Mtpa and the 3-year average sales is 0.003Mtpa.

Landbank

- 4.7. Medway is required to maintain a 7-year land bank for sand and gravel. Permitted reserves are considered to be 1,310,000 tonnes. The current landbank calculated using the 10-year average sales is 218 years.
- 4.8. Due to Medway's geology, it is not appropriate to maintain a landbank for land won crushed rock; or a separate landbank for soft sand from sharp sand and gravel.

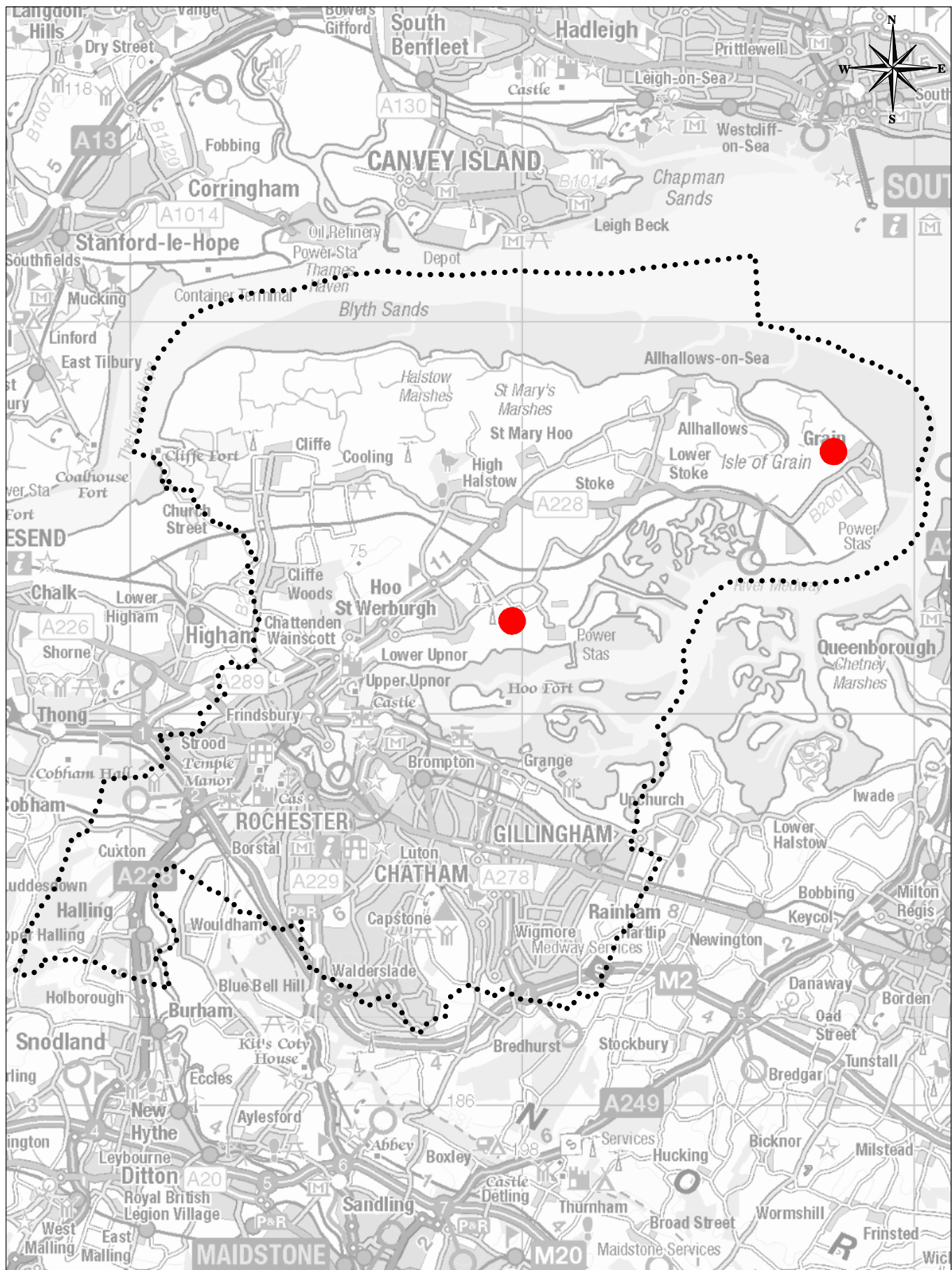


Figure 5: Quarries in Medway



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5. Recycled and Secondary Aggregates

- 5.1. Materials defined as recycled or secondary aggregates are derived from demolition and construction waste, and industrial by-products such as power station ash, colliery spoil, blast furnace slag and slate. Materials can be used as substitutes for aggregates, such as in concrete production, and as fill. The use of recycled and secondary aggregates is critical to the sustainable management of primary mineral resources.
- 5.2. In-line with government policy to secure the valuable finite resources of materials required for development, the council promotes the use of alternatives to primary aggregates.
- 5.3. Facilities exist within Medway for the recycling of construction, demolition and excavation (CD&E) waste at fixed sites. However there is additional capacity, as it is understood that significant amounts of material are dealt with on site by mobile plant as part of demolition and construction processes. Due to the low number of returns received from operators to the Aggregates Monitoring Survey 2016, it is likely that there are other fixed-site operators within Medway whose sales are not currently being recorded.
- 5.4. The level of recycled and secondary aggregate sales in Medway is shown in Table 4 below. In 2016 the level of sales was 0.06Mt, showing an increase of 0.03Mt (109%) from 2015 to 2016. This was 48% above the 3 year sales average and 3% above the 10 year sales average. Table 4 provides full breakdown of recycled and secondary aggregate sales. 10-year average sales begin in 2014 due to limited data being available for the years prior to 2005.

Table 4: Annual sales of recycled and secondary aggregates in Medway

| | Annual sales (Mt): Recycled and Secondary Aggregate | 3-yr average sales (Mt): Recycled and Secondary Aggregate | 10-yr average sales (Mt): Recycled and Secondary Aggregate |
|-------------|--|--|---|
| 2012 | 0.02 | 0.05 | N/A |
| 2013 | 0.02 | 0.04 | N/A |
| 2014 | 0.04 | 0.02 | 0.07 |
| 2015 | 0.03 | 0.03 | 0.06 |
| 2016 | 0.06 | 0.04 | 0.06 |

- 5.5. It is worth noting that a number of recycling facilities (including those that handle recycled aggregate) are currently subject to temporary planning permission due to forming part of the wider long-standing regeneration programme for the area. Work to identify alternative sites for such uses is being pursued through the Local Plan.

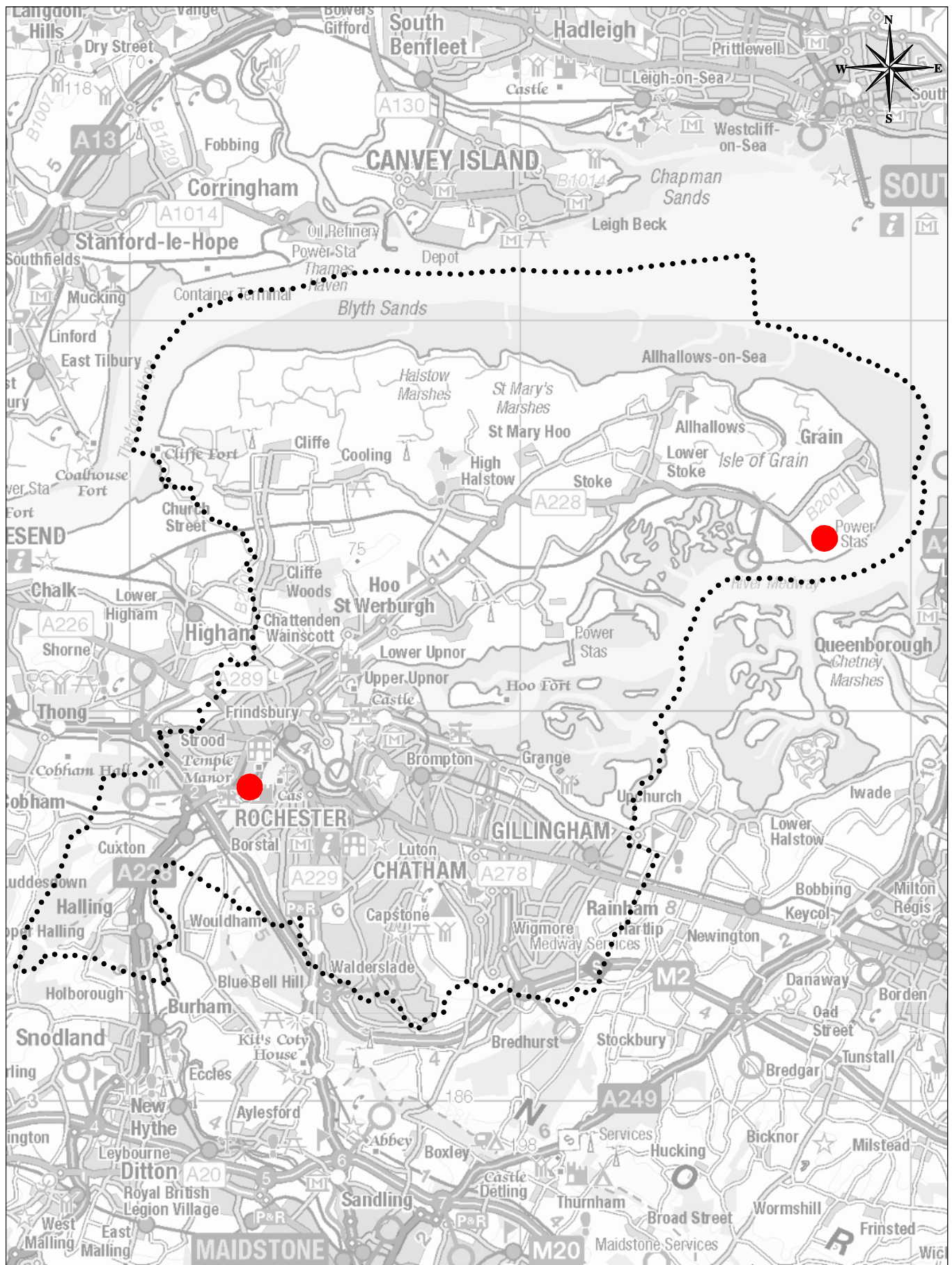


Figure 6: Recycled and Secondary aggregates facilities



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6. Future Aggregate Demand

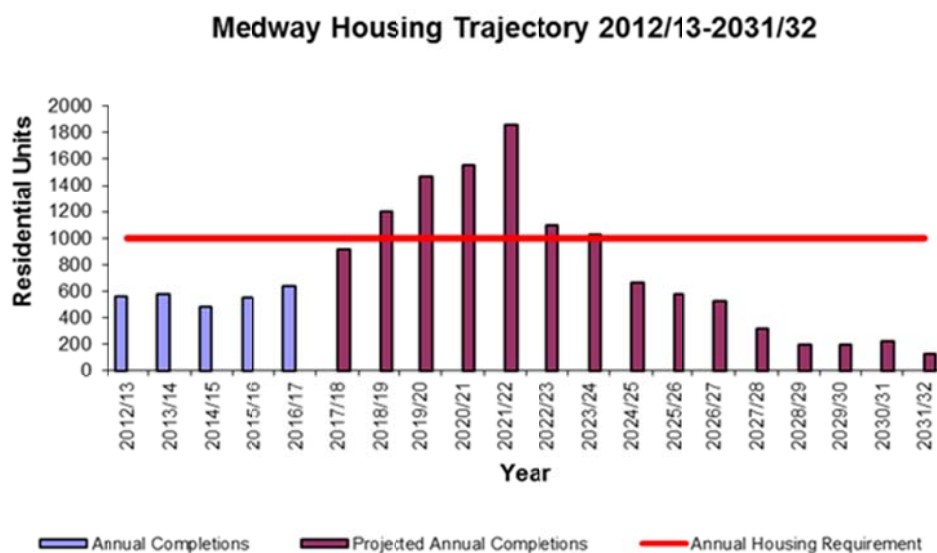
6.1. In 2015 Medway jointly commissioned a North Kent Strategic Housing and Economic Needs Assessment with Gravesham Borough Council to provide an evidence base for housing, employment and retail needs in Medway over the plan period. This research showed a need over the plan period for:

- 29,463 homes.
- 49,943 m² of B1 office space; 155,748 m² of B2 industrial land; and 164,263 m² of B8 warehousing land.
- 44,100 m² of comparison retail floor space and 13,200 m² of convenience (supermarket) retail space up to 2031.

Furthermore, the Council is actively undertaking ongoing work to identify supporting infrastructure needs.

6.2. The delivery of housing in Medway, like many other areas of the country, experienced challenging market conditions with the construction of 642 houses completed in 2016/17, against an annual target of 1,000 homes. Figure 6 outlines the completions of new homes in Medway over the last few years.

Figure 6: Annual housing completions compared to annual housing requirement in Medway



6.3. More regionally, a number of planned infrastructure projects are likely to put increased pressure on the supply of aggregates through Medway, including:

- **The Lower Thames Crossing:** A 13-mile new road and bored tunnel crossing under the River Thames between the east of Gravesend and Tilbury.
- **Crossrail 2:** A proposed major new rail route through London between Surrey and Hertfordshire.

- **Thames Tideway Tunnel:** A 16-mile drainage tunnel through London.
- **Northern Extension Line:** An extension to the London Underground Northern Line to Battersea.
- **High Speed Rail 2:** A planned high-speed rail link between London and initially Birmingham (Phase 1), but later Manchester, Sheffield and Leeds (Phase 2).
- **Ebbsfleet Garden City:** A planned development of up to 15,000 homes and 45,000m² of commercial floor space.

6.4. In order to deliver the projects noted above, Medway will endeavour to maintain a landbank and ensure that its aggregates infrastructure, essential for its distribution, is safeguarded through the application of appropriate planning policy.

6.5. Due to the abundance and low demand for clay, chalk and brickearth, further work will need to be undertaken through the emerging Local Plan to identify future demand for these minerals and to safeguard existing workable reserves where necessary.

Capacity

6.6. The 2016 Aggregate Monitoring Survey for the first time requested information on site operating capacities. It is hoped that by understanding the current operating capacity of a site, future aggregate demands can be more efficiently planned. Returns on this information were received only for the wharves, where a total capacity of 4Mt is identified.

6.7. Due to being the first year that operating capacities have been requested, past trend data is not currently available. However, it is possible to compare sales data where possible against operating capacity to understand future capacity to accommodate an increase in demand. Table 5 below compares total sales (Mt) of aggregates through wharves against operational capacity.

Table 5: Total aggregate sales through wharves and operational capacity

| | Total aggregate sales: wharves (Mt) | Total operational capacity (Mt) | Void (Mt): (Capacity – Sales) |
|-------------|--|--|--------------------------------------|
| 2012 | 1.98 | 4 | 2.02 |
| 2013 | 2.25 | 4 | 1.75 |
| 2014 | 2.36 | 4 | 1.64 |
| 2015 | 2.78 | 4 | 1.22 |
| 2016 | 3.10 | 4 | 0.90 |

6.8. From the data provided through the 2016 Aggregate Monitoring Survey it is clear that there is ample capacity across all aggregate streams capable of accommodating future increases in demand. Further information regarding the operational capacities of quarries and recycled and secondary aggregate facilities will be sought to provide a more detailed overview of Medway’s aggregate handling capabilities.

7. Conclusion

7.1. The emerging Medway Local Plan is currently being prepared, with an anticipated submission date of 2019. Whilst no draft policies have so far been established, policy approaches were consulted on through the Regulation 18 Development Options consultation held in early 2017. The policy approaches included:

- Sustainably deliver a steady and adequate supply of land-won sand and gravel.
- Maintain a 7-year landbank of permitted sand and gravel reserves.
- Support regional consideration and planning of aggregates through our membership of the South East England Aggregates Working Group.
- Promote the transportation of minerals by water and rail for longer distance distribution.
- Safeguard identified areas of proven and unproven unconstrained reserves of river terrace sand and gravel reserves from development that may prevent their future extraction.
- Safeguard all existing mineral wharves, rail depots, storage, handling and processing facilities from development that may prejudice their continued use for the importation of crushed rock, sand and gravel and other associated materials.
- Ensure that any new permitted quarry is returned to a suitable condition for reuse after operations have ceased.
- Promote the use of secondary aggregates, requiring the reclamation and reuse of materials on redevelopment sites.
- Allocate sites for the processing, sorting and distribution of aggregates.

Support of these policy approaches has been received from industry operators.

7.2. The assessment of current demand based on the 10 year sales average shows that sales are slowly increasing in line with a wider trend for the increased use of materials resulting from the improving build rate in the construction sector in recent years.

7.3. Calculations on the current levels of supply are based on the 10-year sales average using the NPPF and NPPG guidance. This provides a landbank of over 218 years.

7.4. The extant planning permission for the aggregates extraction site at Kingsnorth that makes up a large proportion of Medway's reserves is now being implemented.

7.5. The council intends to consider the need for further allocations for minerals extraction to meet local needs and to contribute towards a steady and adequate supply at a strategic level through the emerging Local Plan.

- 7.6. Medway has a strategic role in the importation of aggregates through its large wharves on the rivers Medway and Thames. Their ability to handle large vessels and the proximity to markets in the south east and London gives these wharves significance of a regional and even national scale. This is borne out in the data relating to the quantities of marine dredged aggregates and imported crushed rock landed at wharves in Medway. The facilities have surplus capacity and therefore are able to respond to an increase in demand. The Medway wharves are linked to the producers of imported crushed rock, and with the Glensanda quarry benefitting from planning permission until 2043; this provides a degree of certainty of supply.
- 7.7. Medway will see large local economic changes over the coming years with the development of several major infrastructure and housing projects planned to manage the projected increases in population. The demand for minerals is therefore likely to increase to meet the demands of the projected growth.
- 7.8. It is considered that Medway is making adequate provision to ensure the steady supply of aggregates from a range of sources, and that it can continue to make an effective contribution to meeting local and wider needs for aggregates. The council will actively participate in the work of SEEAWP and maintain cooperative working with neighbouring Minerals Planning Authorities and industry representatives in progressing work on a new Local Plan.
- 7.9. The LAA has now been formally considered and agreed by SEEAWP on 6th November 2017.

**Appendix A: Aggregate Supply Summary Table
Medway 2017**

| | Sales (Mt) | Av. (10-yr) Sales (Mt) | Av. (3-yr) Sales (Mt) | Trend | LAA Rate (Mt) | Reserve (Mt) | Land bank (Yrs) | Capacity (Mtpa) | Comments |
|---|-----------------------|---|--|--------------|------------------------------|-------------------------|--------------------------------|----------------------------|--|
| Sharp Sand & Gravel | 0 | 0.006 | 0.003 | - | 0.006 | 1.31 | 218 | Not known | 2 quarries, both inactive. No sales reported for 2016. See LAA for further information. |
| Soft Sand | 0 | 0 | 0 | N/A | 0 | 0 | 0 | 0 | No known reserves. |
| All Sand & Gravel | 0 | 0.006 | 0.003 | - | 0.006 | 1.31 | 218 | Not known | 2 quarries, both inactive. No sales reported for 2016. See LAA for further information. |
| Crushed Rock | 0 | 0 | 0 | N/A | 0 | 0 | 0 | 0 | No known reserves. |
| Recycled/Secondary Aggregates | 0.06 | 0.06 | 0.04 | | N/A | | | 0.1 | Temp permission may impact upon supply; alternative sites may need to be identified through the Local Plan. |
| Marine Sharp Sand & Gravel | 1.98 | 1.39 | 1.72 | | N/A | | | 4 | Established importation and distribution facilities. The capacity is combined total for all wharves across all aggregate types. |

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| Marine Soft Sand | 0.2 | 0.07 | 0.1 | | N/A | | | 4 | <p>Established importation and distribution facilities.</p> <p>LAA rate based on the recent importation of marine-won Soft Sand.</p> <p>The capacity is combined total for all wharves across all aggregate types.</p> |
| Rock Imports by Sea | 0.91 | 0.98 | 0.92 | | N/A | | | 4 | <p>Established importation and distribution facilities.</p> <p>The capacity is combined total for all wharves across all aggregate types.</p> |
| Rail Depot Sales (Sand & Gravel) | c | 0 | 0 | | N/A | | | 0.1 | <p>Established aggregates rail depot.</p> <p>Sales data not published due to commercial confidentiality.</p> |
| Rail Depot Sales (Crushed Rock) | c | 0.02 | 0.02 | | N/A | | | 0.1 | <p>Established aggregates rail depot.</p> <p>Sales data not published due to commercial confidentiality.</p> |

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| Comments | <p>The supply of aggregates in Medway is currently sufficient, with the existing importation facilities providing a high percentage of aggregates for the wider London and South East area. With planning permission granted for a sand and gravel quarry at Kingsnorth, the supply of aggregates from Medway is expected to increase.</p> <p>In common with much of the SE, there is high demand for housing in Medway. The population has been increasing in recent years and is expected to grow further with 29,463 houses needing to be constructed to meet the projected housing demand across the Local Plan period to 2035.</p> <p>Other major construction projects proposed in the wider South East region include Ebbsfleet Garden City, Lower Thames Crossing, Thames Tideway, Crossrail 2, HS2 and the London Underground Northern Line extension.</p> |
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