Willogoleche Expansion



Traffic Management

One of the most important factors for achieving a safely constructed wind farm is traffic management and route feasibility. Wind turbine towers and blades are inherently large, and a high frequency of traffic is associated with the civils works including the foundation and road construction.

It is proposed that the expansion of the Willogoleche Hill Wind Farm will utilise the same access routes and site entrances as the existing consented portion of the wind farm. Depending on the final turbine selection, the number of abnormal load movements could increase by up to 50%.

Construction of both phases of the Wind Farm will occur at the same time and therefore will be covered by a single traffic management plan which will be agreed with the Council and will include safety aspects of transporting the turbines from port to site and include sizes and numbers of all extra traffic generated by the construction and operation of the entire Willogoleche Hill wind farm.



Figure: Truck transporting a large turbine blade.



Grid Connection

The combined Willogoleche Hill wind farms are expected to produce around 80MW of electricity, which will be fed into the ElectraNet 275kV network. Currently we are investigating two options for the powerline; one using an underground connection to a new substation sited about 2km south west of the windfarm, and the other being a 15km overhead line along the Hallett to Jamestown Road to the new Belalie substation which was built for the Hallett 4 (North Brown Hill). The Belalie substation is being considered as a connection option due to the costs involved in the construction of a dedicated on-site substation at Willogoleche.

The Planning application for the Grid Connection will be separate from the planning application for the expansion of the wind farm, primarily because discussions with ElectraNet regarding selection of the connection point are ongoing.

Figure: Grid connection options for the Willogoleche Hill Wind Farm