



*Site of the original junction of the Wolgan Valley Railway with the formation of the abandoned Dargan's Creek deviation going to the left.*  
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efforts with the Penrose Creek route (the one finally adopted) and Mr. Thom investigated an alternative, known as the Sunnyside Route, which left the main ridge a few miles out from the Junction. This latter route provided a good line but, as the curves and grades were no better than those associated with the Penrose Creek proposition, coupled with the fact that a considerable area of private property would have been traversed, it was not adopted. Pending the determination of a practicable route into the valley, Mr. Rhodes re-ran portion of Mr. Cardew's survey over Constance Gorge.

An early determination of the site for the junction with the Great Western Railway was made by Mr. Deane, who, after investigating several alternatives, decided on a point 86 miles 70 chains (old mileage) from Sydney and about 1½ miles on the Sydney side of Clarence, the locality then being known as Dargans.

The descent from the long scrub-covered ridge, forming the divide between Wolgan Creek and Main Creek, both outer tributaries of the Colo River, into the Wolgan Valley necessitated the expenditure of much time and energy by the surveyors and, although the survey of this part of the line was

commenced in April 1906, the final location between 20 miles and 31 miles, was only completed in advance of the earthworks in November 1907.

The design adopted confined the steepest grade of 1 in 25 uncompensated (equivalent to a ruling grade of 1 in 22.5) to the section between 19 m. and 29 m. Between the junction and 19 m., the ruling grade against the load (up direction) was 1 in 50 but some grades of 1 in 30 were introduced in the opposite direction on this section. The line was thus designed for staging the loads in two portions from the valley to the 19 m. station.

The earthworks and permanent way were carried out by day labour under the supervision of the engineer-in-charge, Mr. J.D. Simpson, thus economising in the time that would be taken in the preparation of detailed drawings and setting out. Earthworks at the junction were commenced in November 1906 and, by December, a start had been made at 26m.50c. working back towards the tunnel. Gangs were also put to work on the steep grades between 20 m. and the valley. No. 2 Tunnel was completed in June 1907 and, by November 1907, the laying of rails had been completed from the junction to 31m.50c., thus