to serve a number of adits driven into the Cedar Creek shale outcrop below the southern cliff face of The Bluff. The main line of the tramway passed southward along the ridge saddle, keeping to the eastern side of the Ruined Castle. In this area was sited the former outer terminal of the ill-fated aerial ropeway installation.

Sheltering under the eastern side of the dividing ridge and below the level of the horse-tramway were a number of miner's cottages, of primitive design, occupied, so it has been said, mostly by single men. There was also a works office placed beneath the lee of the Ruined Castle. After the closure of the mines these habitations were abandoned and later destroyed when bush-fires swept through the area, only the foundation stones and rock-built "outside" chimneys remaining to denote their site.

Beyond the Ruined Castle the tramway diverged to form two lines, one leading south-eastward to connect with a series of adits driven below the imposing cliff-face of the isolated Mount Solitary, whilst the other served a similar purpose along the short western side of the same precipitious mountain where the huge sandstone buttresses overlooked the talus slopes and foothills of the Cedar Creek Valley. An old map revealed that at least thirtythree shale adits were driven, at various times, into the deposits outcropping in the Ruined Castle area, the mineral being of first class quality. It is reasonable to assume that each adit had its short branch line laid between the working face of the seam and the main tramway track. It was company policy, which also applied to the Glen Shale Mine, to take out "Export" class shale for transport to North's Siding and beyond, leaving the "Second grade" and "Smalls" stacked in heaps outside the particular adit from whence it came. Retorting operations to treat these "Small" shale accumulaations had not been implemented hence they were regarded more or less as waste material.

The skips in use on the Ruined Castle horseoperated tramway each had capacity for about half a ton of shale. They were, on the outward journey, usually marshalled in rakes of five and hauled by two horses harnessed in tandem, the driver sitting on a chaff-bag in comfort on the loaded leading vehicle. Some of the skips were made by Messrs Robert Hudson of Sheffield and others came from the works of Adolf Bleichert of Leipzig, Germany. The skip bodies were fashioned from sheet wrought-iron plate and had a length of fifty-four inches, the width being thirty-six inches, and the depth to the semi-circular bottom was twenty-seven inches. The end-plates were flanged and rivetted whilst the upper outer edges of the body were strengthened by a rivetted beading. Four lifting lugs were fitted, one at each corner of the end-plates, whilst small rectangular shaped blocks of wood were bolted to the lower surface of the side-plates to which the longitudinal timber frames were attached. Four nine-inch diameter cast-iron wheels were firmly fixed to the axles, the latter revolving in cast-iron plummer blocks bolted beneath the framing. There were outer skips in use which conformed to the standard wooden boxbodied pattern generally in use on colliery skipways.

## THE CLOSURE OF THE RUINED CASTLE AND THE GLEN SHALE MINES.

Shale mining activities at both the Ruined Castle and The Glen shale mines gradually came to a close about 1895, the seams were becoming exhausted, whilst the returns from coal sales were rated as low as four shillings per ton. The adits were closed by the simple method of "blowing down" the rock and earth surrounding their portals thus preventing further entrance, and the tram lines and other surface appliances were subsequently taken up. By 1903 the shale industry at Katoomba was abandoned, although it has been mentioned that The Australian Gaslight Company of Mortlake relaid the tramway to the Glen Shale mines in order to remove a stock pile, estimated to contain some 16,000 tons, of second grade shale which lay at grass outside the adits. Recurrent bush-fires burning over the Ruined Castle area destroyed most of the dumps of shale trimmings left outside the various adits, the residual ash remaining alight, under a cold surface, for many years, a dangerous trap for the unwary bush-walker. These ash heaps betrayed their presence when viewed from the cliff top lookouts at Katoomba, by a thin ethereal column of white vapour rising above the dense tree cover of the low ridge lying between Mount Solitary and The Bluff section of Mount Megalong.

The mining settlement at Nelly's Glen did not long survive the closure of the West Katoomba

Opposite:

The main incline at Katoomba, the upper portion of which is now used by the scenic railway. The incline at the left leads to the coal mine and the shale mines beyond.

Mining Museum.