

entire line. They are 110 feet long, clear of the gates, 33 feet wide, with 5 feet depth of water over the sills. The gates are framed of oak, and are put up in a most substantial manner. The crabs, chains, and other iron works were manufactured in England, and at Three Rivers, Lower Province, and the heavy smith's work was done at Bytown. They are of the very best materials, and of the most approved patterns. Between the third and fourth lock is a capacious basin, built in the same manner as the locks, sufficiently large for the largest sized steamboat to turn or pass. The time of passing the locks will occupy twelve minutes each upon an average, so that if a steamboat has a barge in tow, nearly two hours are lost in detention. The locks themselves are situated on the western side of the old falls, and the site they now occupied was blasted out of the solid granite rock, nearly 23,000 cubic yards of which were removed. To raise the waters at this place, a dam and two extensive embankments are made: the Dam is built with rough lime stone, is about 350 feet in length, is 34 feet high in the centre, and is flanked at the east end by the waste weir; one embankment to the eastward extends 2600 feet, and the other to the westward of about 3200 feet in length. The height of these embankments is various, the highest part about 23 feet, and the lowest not exceeding so many inches. They are well built with stone and clay, but are not perfectly water tight. Over the locks is thrown a long and lofty wooden bridge, the high road to Montreal passing through the village. The probable cost of these works, which are third in point of extensiveness on the line, was about £60,000, the last estimate given by Lieutenant Colonel By amounting to £52,274. The sole contractor and architect was R. Drummond, Esq. of