

satisfactory. The rather clumsy boat and low power motor while not adapted for navigating against the current were admirable for going with it, and had the trip to be made over again I know of no important detail that might be altered.

The river was at about mid-height. The high spring floods were past but the water had not reached its low summer level. No rapids of importance were encountered and in only two places was navigation more than mildly exciting. The first was the "Canyon," some twenty-five miles from Red Deer via the river, though only eight miles overland. The other was just above the Grand Trunk Pacific Railway crossing south of Alix between camps 3 and 4. We had heard from residents of the danger of these places and probably at certain stages of water they may be bad, but when we passed we found that the risk had been much exaggerated.

From Red Deer to Drumheller the river was usually deep and water could always be found for much deeper draught than ours. Occasional shallows occurred and islands divided the current, necessitating some care in choosing the proper channel. It was necessary also to put such a motor as we had on a hinge to avoid disaster when through misjudgment the wrong channel was taken and shallow water was unexpectedly encountered. A little above Drumheller and continuing below, the river widens and shallows and the bottom changes from boulder and gravel to sandy mud, forming shifting shoals between which the channel meanders confusingly, rendering navigation more complicated though mistakes were annoying rather than serious.

The whole valley of the river lies some 100 to 250 feet below the general prairie level. Above Nevis, Camp 4, it is comparatively narrow and bounded by simple hills, steep bluffs or rocky cliffs, usually as well covered with vegetation as the slope and age of exposure permits. The prairie begins close to the river at the verge of the first embankment and the ox-bow bends are well wooded. Below Nevis the aspect of the landscape changes considerably, bare, raw, freshly eroded exposures are the rule and bad-land conditions are assumed. The ox-bows are extensive gumbo flats with the woods confined to the river edge; otherwise bare bluffs rise straight from the water, or raw clay hills, striped horizontally with black coal seams, succeed each other as far as the eye