

On the economical application of native materials of construction, by Mr. Thomas.

On the varieties of native timber with specimens, by Mr. J. S. Dennis.

On the application of Screw Piles and Moorings, by Mr. Brunel.

The Canadian Journal.

TORONTO, AUGUST, 1852.

We cannot more appropriately introduce the Canadian Journal to the public, than by submitting a brief exposition of its claims to support, conjointly with an appeal to the professional men scattered throughout the country, whose experience and opportunities confer on them that power of co-operation upon which the ultimate success of this journal mainly rests.

If proof were wanting of the necessity which exists in this Province for a publication devoted to the Arts and Sciences of practical life, in addition to what is foreshadowed in the introduction to the present volume, it would suffice perhaps to enumerate the numerous foreign scientific and artistic periodicals which meet with a liberal patronage in Canada, and which are not unfrequently made the medium of communicating to the world the discoveries and inventions of the "sons of the soil." It might, with equal force, be urged that many useful additions to knowledge—especially the knowledge of our own country—are withheld from the light by the absence of that encouragement and assistance which the Canadian Journal aspires to contribute.

We do not, however, appeal to a spirit of nationality, deeply rooted, and most worthily so, as that sentiment is in the breasts of Canadians,—nor do we rest our claim to public encouragement upon the meritorious object of snatching original thought from obscurity, we have a more extended and far more practical design in view. We are endeavouring to supply such a publication as will afford a medium of communication between all engaged or interested in scientific or industrial pursuits, will assist, lighten and elevate the labours of the mechanic, will afford information to the manufacturer, and generally administer to the want of that already numerous and still increasing class in British America, who are desirous of becoming acquainted with the most recent inventions and improvements in the Arts, and those scientific changes and discoveries which are in progress throughout the world.*

It were vain to suppose that the professional man generally, or the enterprising manufacturer, much less the scientific farmer, or the enquiring mechanic could command needful information respecting foreign or domestic progress in practical science and art from the pages of those publications which, out of the abundance of their resources, necessarily limit their range to one or two departments of industry or knowledge; which are not generally

accessible on account of their expense, and which aim at a standard adapting them to the demands of a highly artificial and wealthy condition of society, rather than to the exigencies of a young and rapidly progressive people.

Even were the excellencies of foreign periodicals presented to the Canadian public in a form accessible to all classes, yet, such a publication would not meet the demands of the present day. As a thriving agricultural and commercial people—sprung, as it were, into existence during the last half century—we require special adaptation of many artifices and inventions to those unavoidable conditions which attach themselves to communities in new and extensive countries. We require information respecting many physical features of our territory, which, in the course of time, must impress with their influence our industry and prosperity. Our commercial relations demand an intimate and widely diffused acquaintance with the advantages we enjoy in relation to geographical position, soil, climate, productions, economic mineral resources and means of communication; and lastly, the imposing increase in the population of the Canadas, which numbers, while we write very nearly two million people, imperatively solicits that exertion which, if rightly directed, may place our literary and scientific achievements usefully and even prominently before the world.

Where may we hope to look for information relating to the Canadas if Canadians themselves do not supply the materials and furnish the record? How shall we elevate our position in the world of science and of letters if the "sons of the soil" do not arouse and exert themselves?

In every part of Canada men are to be found possessing high scientific attainments or profound practical knowledge. To many such we look for co-operation with confidence, now that a fitting medium for the publicity of the information they possess and are daily acquiring is hopefully offered to them.

The stupendous railway operations now in progress in many parts of both Provinces, present rare opportunities for obtaining much needed information respecting the geological features of the country through which they pass. The frosts of a single winter will, in many instances, obliterate all surface traces of strata possessing economic importance, until accident leads to their discovery at some future and perhaps distant period. We earnestly desire to enlist amongst the contributors to this journal the gentlemen engaged in the construction of those extensive lines of communication.

The ample opportunities for observations of the most useful description which are enjoyed by surveyors, induce us respectfully to solicit their correspondence on all matters relating to the physical features and natural history of the districts in which they may be engaged.

To the operative, deriving from experience a purely practical knowledge which experience alone can give, we address ourselves in the hope of obtaining assistance and counsel in matters wherein the busy lessons of the workshop are far more valuable than the unapplied speculations of retirement and study.

It is not our intention to trespass upon the field now occupied by our contemporary the *Agriculturist*, yet so vast and unex-

*Vide Prospectus.