order to effect sales. None of the extracts has a specific reference, although there is a list of sources, and there is no index, which is always tiresome. The maps — of the North Polar region, the Ellesmere Island region, Zemlya Frantsa-Iosifa, and Svalbard — are taken from those that appeared in Holland's encyclopaedia, save that the place names have been, where necessary, anglicised. There are also one or two minor slips. According to Holland's encyclopaedia, the leader of the British 1818 expedition toward the North Pole was indeed David Buchan but he sailed on Dorothea, while his subordinate John Franklin sailed on Trent, not the other way round, as is indicated. The complements of the ships also differ from those quoted in Holland's encyclopaedia. And mention is made of Horatio Nelson's famous incident with the bear, and there is a quotation from Southey's biography of Nelson, but this work is not included in the list of sources.

The presentation of the book is attractive and of a much higher quality than would be suggested by the price. The illustrations are well chosen to inspire the interest of the reader who might casually flip through the work in a bookshop. The dust jacket is very well designed, using the well-known picture of *Fram* frozen in the polar ice on the front and a suitably robust one of Peary on the rear.

To conclude, the book demonstrates that established experts can produce works that will attract the attention of a non-expert reader, hold that attention by careful juxtaposition of original text and inserted comment, and, one hopes, inspire further reading in the subject. At all events, this book is very much more to be welcomed as an introduction to Arctic exploration than some of the recent popular productions by authors whose actual knowledge of the subject is at most very limited. It is highly recommended. (Ian R. Stone, The Registry, University of Kent at Canterbury, Canterbury, Kent CT2 7NZ.)

THE ALASKA TRAVEL JOURNAL OF ARCHI-BALD MENZIES, 1793–1794. Wallace M. Olson (Editor). 1993. Fairbanks: University of Alaska Press. xv + 247 p, illustrated, soft cover. ISBN 0-912006-70-6. \$17.50.

The Scottish surgeon Archibald Menzies served on board Captain George Vancouver's command, *Discovery*, on the great British expedition to the Pacific in the 1790s. Menzies had previously been to the Pacific, with Captain Colnett, a maritime fur trader, and was thus familiar with certain aspects of the northwest coast and its native peoples. His journal provides a 'window on the world' at that particular time, and its publication in this form is a useful addition to the literature of science and exploration. The full documentation is available in the original, in London and Australia, from whence the editor has gathered materials for this edition.

Menzies, it seems, was a matter-of-fact observer, and his 'travel journal,' as the editor classifies it, is a rather dry and unenlivened account. Even so, Menzies was thorough in his work and particularly careful in recounting that which he saw. It is clear that Vancouver and Menzies had little in common. The captain did not endear himself to the surgeon-scientist by trying to get hold of the latter's papers and records. Menzies, however, held his ground.

It is not clear to this reviewer that this edition can be classified as 'definitive.' Surely, discussion of Vancouver's near meeting with the North West Company trader Alexander Mackenzie on the northwest coast in 1793 needs proper citation from the W. Kaye Lamb edition of Mackenzie's letters and journals. Moreover, Menzies' appointment to the Vancouver voyage, and his connections with the scientific circles of the day, need further examination. Menzies advised government on what trade goods the northwest Indians would consume, and, as the government was anxious to win friends among these people, its agents took his advice, as they did that of Vancouver. This book has extensive notes, many of which do not include follow-up references, and a bibliography. Of particular value is a list of the botanical collections contained in an appendix. This was a project well worth doing, and northwest coast history is the better for it. Taken together with C.F. Newcombe's Menzies' journal of Vancouver's voyage: April to October 1792, with biographical note by J. Forsyth (Victoria: Archives of British Columbia Memoir, 1923), we have a rather full covering of the waterfront, as it were. Much more remains to be discovered about Vancouver, his officers and men, and surgeon Menzies. This book points the way to showing the complexities of the lives of these explorers on such longranging expeditions. Not least, this edition brings into print a valuable journal. When Menzies' correspondence is published, and this is promised from the Natural History Museum, we will have an enlarged assessment of Menzies, his life, and times. (Barry M. Gough, Department of History, Wilfrid Laurier University, Waterloo, Ontario N2L 3C5, Canada.)

THE PHYSICS OF GLACIERS. Third edition. W.S.B. Paterson. 1994. Oxford: Elsevier Science. ix + 480 p, illustrated, soft cover. ISBN 0-08-037944-3. £25.00.

The 14 years that have passed since the publication of the second edition of *The physics of glaciers* have seen major advances in the understanding, measurement, and modelling of ice masses. So rather than simply revising one of the most-cited glaciological textbooks, W.S.B. Paterson has rewritten much of it in order to produce the long-awaited third edition.

Although the aim of the book, and the level of mathematics, remains unchanged — being appropriate for the graduate level — since both the structure of the book has been altered and much of the information is new, this edition could be considered not so much an update as a new book. The revision includes an original chapter on the deformation of water-saturated sediments at the base of glaciers, and significant chapter rewrites on the issues of basal sliding, glacier surging, glacial hydrology, and numerical modelling of ice masses. One very welcome addition is the appendix on the concepts of stress and

strain, and their application to glaciology. As ever, the text is clear and concise, with many fine papers referenced in order to provide the reader with more substantive evidence, and numerous clear and informative diagrams.

Dropped from the book is the second edition's rather weak chapter on glacier measurement techniques. One disappointing aspect is that, as in the previous editions, there is no discussion on the processes of glacial erosion and sedimentation. Another is that, although the mathematical treatments are clearly presented, understanding of the physical concepts presented would be far easier if a 'list of symbols' was included as an appendix.

The structure of the book has obviously been carefully designed so that topics follow each other well. However, the order of the chapters takes some time to get used to. In particular, the discussion of the flow of glaciers and ice sheets curiously appears in chapter 11 (in the second edition, this relatively fundamental subject was dealt with much earlier). Consequently, whilst readers who are familiar with contemporary glaciology will have little problem in understanding the format, undergraduate students may well find the book more difficult to follow than the second edition.

Paterson points out that the third edition will be his last. When one considers that the subject of, and the variety of subjects within, glaciology has expanded so much during the past 14 years, it may be that a fourth edition of *The physics of glaciers*, aiming to combine all aspects of modern glaciology at an equally advanced level as the third edition, may be too ambitious.

This edition of *The physics of glaciers* will rightly remain the most comprehensive glaciological textbook for the remainder of the decade. Moreover, together, the three editions serve as benchmarks for that which has been understood in the subject of glaciology throughout the last 30 years. (Martin Siegert, Centre for Glaciology, Institute of Earth Studies, University of Wales, Aberystwyth, Dyfed SY23 3DB.)

LABRADOR WINTER: THE ETHNOGRAPHIC JOURNALS OF WILLIAM DUNCAN STRONG, 1927–1928. Eleanor B. Leacock and Nan A. Rothschild (Editors). 1994. Washington, DC: Smithsonian Institution Press. xxvi+235 p, illustrated, hard cover. ISBN 1-56098-345-0. £34.95; US\$53.95.

'The wind had died down and the country lay beautiful in its empty vastness. There was no sound save the little waves on the beach and the silence was almost oppressive' (page 25). Poetic, sensitive, meticulous and scholarly, Labrador winter is a genuine rarity. It cannot be a frequent occurrence when an incomplete manuscript by a long-dead author, based upon his journal recording fieldwork experiences of nearly 70 years before, becomes the mainstay of a current work. Perhaps more surprising is the decision to resurrect such a manuscript in as original and unexpurgated a form as possible. However puzzling, the wisdom of presenting Labrador winter to the reader as

historical artefact soon becomes apparent in the light of its profound relevance to the history of ethnographic studies.

Fieldwork as a direct method of obtaining information about a social group through first-hand intensive or participant observation was a comparatively new phenomenon in the field of anthropology in 1927–1928. Its earlier successes, marked in particular by the 1898 Torres Straits expedition, not only represented a movement away from the 'armchair' speculations of earlier practitioners, but also served to define ethnography as a term synonymous with the first-hand descriptive activities and results of social and cultural anthropology. As Strong remarked in his journal, '...culture is no projection of a scholar's dream of what it should be, but a living subtle entity' (page 112). 'My purpose was to see how they lived, to watch them hunt, and to learn and write as much about their life as I could' (page 42).

Labrador winter is a lively specimen of early twentieth-century fieldwork, but with an important ethnographic dimension. On the one hand, Strong's account is the expected rigorous, scholarly record of Naskapi Indian hunting, fishing, lodge building, snowshoe making, skin preparing, customs, myths, social structure, genealogy, and language; on the other hand, it is also a touchingly human (and sometimes far from smooth) rite de passage of a young man into the discipline of anthropology. Humour, wit, honesty, occasional ambivalence, and his sensitivity to his own role among the Naskapi people are all hallmarks of Strong's journal that lend a frank authenticity to his manuscript, in ethnographic terms, as a carefully balanced version of events.

In retrospect, the poverty of much early ethnographic study was the paucity of information regarding the relationship between the observer and the observed, coupled with an unwillingness on the part of the observer to recognise that he was, in fact, part of the material collected. It is important to realise that Leacock and Rothschild's presentation of these unexpected elements of Strong's journal is not a precipitant decline into sentimentality or crude hagiography, but a way of emphasizing that Strong's ethnographic practice was markedly different to that of many of his contemporaries. Thus, at one point, Strong characteristically describes his attitude towards Naskapi drinking practices. 'The care they took of me was rather ludicrous....My cue I suppose would be to pretend to be drunk....The beer is vile stuff — but one can't be a prig, here least of all. My old drinking ethics are still too strong and I won't "wave my arms" unless there are undoubted ethnological gains to be made thereby' (pages 131-132).

Nevertheless, Strong seemed to delight in interacting with the Naskapi and 'wave[d] [his] arms' as much as he could. During his seven months' stay with them, he experienced a kaleidoscope of Naskapi life: he hacked through the ice to fish, camped in freezing conditions, checked traps, and even helped bury their dead. His intimate record is made all the more significant because his experience was of a culture now long since altered out of