THE BOTANICAL LABORS OF THE REVEREND HENRY H. SPALDING

That the Reverend Henry H. Spalding, a pioneer missionary in Oregon of the American Board of Commissioners for Foreign Missions, found recreation in collecting botanical specimens is a fact not generally known to students of the history of the Pacific Northwest. Yet the botanical labors of Mr. Spalding, crude though they undoubtedly were, were sufficiently significant to enlist the interest of Professor Asa Gray of Harvard University.¹ On June 6, 1846, Spalding wrote from his station at Clear Water a letter to the Reverend David Greene, one of the secretaries to the American Board, informing the latter that he was sending him a box of specimens to be disposed of by Mr. Greene "as may be thought best." It was apparently the expectation of Spalding that the proceeds of the sale would inure to the benefit of the treasury of the Board. On March 16, 1848, the Reverend Mr. Greene addressed the following note to Professor Gray: "We have recently received from the Rev. Mr. Spalding of the Oregon Mission a box of dried plants & flowers, gathered by him in various parts of the Oregon country. Should you be in Boston soon, & can without putting yourself to too much trouble, you will oblige me by calling at the Missy House Pemberton Square, and looking at the collection, and giving an opinion as to their value and the best manner of disposing of them."² Professor Gray expressed an interest in the collection, which was thereupon placed in his hands, together with a copy of Spalding's letter relating thereto.3 The result of Professor Gray's examination of the specimens is disclosed in a letter which is reproduced hereafter.

Although Spalding's interest in the flora of the Pacific Northwest may have been stimulated by his contact in 1841 with scientists of the United States Exploring Expedition,⁴ it appears that his

tists of the United States Exploring Expedition,^{*} it appears that his 1 Asa Gray (1810-1888), an eminent American botanist, was elected Fisher Professor of Natural History at Harvard in 1842. He retired from this position in 1873. 2 A. B. C. F. M., Domestic Letter Book, No. 29, p. 268. 3 Asa Gray to D. Greene, March 18, 1848, in A. B. C. F. M., Letters and Papers (Miscl. Dom., 1846-1860), Vol. 270, No. 293; Greene to Gray, April 15, 1848, in A. B. C. F. M., Domestic Letter Book, No. 29, p. 359. 4 In a letter dated at Clear Water, July 12, 1841, Spalding wrote to Greene: "One of their vessels [United States Exploring Expedition] has just entered the C. [olumbia] R.[iver] & two Pugets Sound. Five gentlemen from the latter, viz. Messrs. Johnson, Waldren, Pickering, Brackenridge & Stearns, spent a few days here a short since very pleasantly. They crossed the Mis. from Nesqually to Fort Okanagan on the C. R. from thence to Fort Colvile & from thence to this station by way of Messrs. Walker & Eells station. They went from this to Walla Walla, two of them by way of Waiilatpu. They were engaged in taking observations, measurements of Rivers ,Mts., &c, collecting Geol-ogical & Botanical specimens, &c." In this letter Spalding requested "a work on Geology & Botany." A. B. C. F. M., Letters and Papers (Oregon Indians, 1838-1844), Vol. 138, No. 37. In the preceding quotation Spalding refers to Lieutenant Robert E. Johnson, Purser R. R. Waldron, Charles Pickering, J. D. Brackenridge, and Sergeant Simeon Stearns. Pickering and Brackenridge belonged to the scientific corps of the Expedition. Charles Wilkes, Narrative of the United States Exploring Expedition (Philadelphia, 1845), I, XXXIII ff. ("List of Officers and Men.")

immediate impulse to collect specimens arose from his association with Charles A. Geyer, a German botanist, who was in the Oregon Country in 1843-44.⁵ Mr. Geyer wrote in terms of warm commendation of the assistance he had received from Cushing Eells and Elkanah Walker, missionaries of the American Board, who were stationed at Tshimakain, in the Spokane country; and in his expression of appreciation of the assistance of Spalding, who accompanied him on his explorations in the Nez Perces country, he was equally profuse. From the published notes of Geyer it appears that he and Spalding became more or less intimate, and that Spalding may have been the inspiration for certain observations which Geyer made on the Oregon Mission that particularly redounded to Spalding's credit. I shall return to this subject in a later paragraph.

Since Charles A. Geyer appears to have been instrumental in establishing a contact between Harvard University and the Oregon Country, through the medium of a missionary of the American Board, a brief account of the labors in America of this German botanist should be given. Before undertaking the overland trip to Oregon, Geyer had spent some time in making collections in the Upper Mississippi Valley as botanist to the official expedition of Jean Nicholas Nicollet. For this work he received notice in scientific periodicals both in America and England.⁶ He was well known to Asa Gray, who wrote of him in 1843 as one of the three enterprising botanists then engaged in exploring the most interesting portions of the Far West.⁷ Dr. George Engelmann, of St. Louis, Missouri, wrote of Geyer in 1844 as an excellent collector who had for sale sets of specimens he had gathered in 1842 near St. Louis and in the neighborhood of Beardstown on the Illinois River.⁸

Of his overland journey to Oregon and of some of his contacts in that country, Geyer wrote as follows:

"In the spring of 1843, I set out from St. Louis, Missouri, and joined the party of Sir. W. D. Stewart, of Murthly Castle, Scotland. I not only received every possible assistance from that gentleman, as far up as the Wind River Mountains; but he also kindly provided me with a letter of recommendation to the venerable Governor Mc-Loughlin, of the Hon. Hudson Bay Company, Columbia Department,

⁵ Charles A. Geyer (1809-1853). Geyer's work in the Oregon Country should receive careful study.

⁶ The American Journal of Science and Arts (New Haven, 1843), XLV, 225-227; The London Journal of Botany (London, 1845), IV, 479.

⁷ The American Journal of Science and Arts, XLV, 225-227. 8 Ibid., XLVI, 94. Engelmann was one of Asa Gray's correspondents. Jane Loring Gray, ed., Letters of Asa Gray (Boston and New York, 1893), I, 297-98.

at Fort Vancouver, which enabled me to sojourn in Upper Oregon. and finally to embark, with my botanical collection for London, in one of the vessels of the Hon. H. B. Company.

"The liberality of that body of gentlemen is too well known, especialy in the scientific world, to require any encomium from me, yet I may be allowed to make special mention of the kindness and assistance I received from the Chief Factors, Macdonald, at Fort Colville,9 McKinlay at Fort Walla-Walla,10 and especially from Chief Factor Douglass,¹¹ and Governor McLoughlin,¹² at Fort Vancouver. Not less indebted am I, as well as, I believe, previous botanists, to the assistance of the different missionaries, both Protestant and Catholic. By the kindness of the superior of the Catholic missions. I was permitted to proceed with their caravan to the Flathead mission, after parting from Sir W. Stewart at the Wind River Mountains. I enjoyed their hospitality, and finally accompanied a inission party to the Coeur d'Aleine [sic] Indians, an entirely new field for my researches on the upper waters of the Spokan and Kallispell Rivers.

"For the opportunity of exploring the fertile part of the Spokan country, (which was only visited by the Botanist Douglas¹³ about as far as 80 miles west of Fort Colville), I am especially indebted to the Reverend Gentlemen, Messrs. Eells and Walker, of the American Board of Foreign Missions, at Tshimakain.

"I arrived in the midst of winter, 1843, almost exhausted by want of food, having been lost, and wandering alone in the mountains and woods for thirteen days, where the snow was two and three feet deep. Never shall I forget the kindness and unremitting attention bestowed upon me in that forlorn situation; the more felt after my exposure to the inclemency of the weather for eight successive months. To a brother Missionary,¹⁴ of the same body, I owe the means of visiting another new field, the highlands of the Nez Percez Indians, where he accompanied me on my excursions, and also afforded facilities to investigate the flowery Koos Kooskee vallev over again, where previous botanists had but cursorily passed.

"It must, no doubt, be gratifying to the lovers of natural history that such assistance is rendered to scientific travellers; not only since

- 9 Archibald McDonald, stationed at Fort Colvile (not Colville).
 10 Archibald McKinlay.
 11 James Douglas, afterward Sir James, governor of British Columbia.
 12 Dr. John McLoughlin, Chief Factor at Fort Vancouver.
 13 This reference is to David Douglas, the distinguished Scotch botanist, who was in the Oregon Country between 1825 and 1827. See David Douglas, Journal Kept During His Travels in North America, 1823-1827, ... with Appendices Containing a List of the Plants Introduced by Douglas and an Account of His Death. ... (London, 1914).

¹⁴ Henry H. Spalding.

it would be impracticable, even with all the means, to traverse the different Indian tribes unmolested, or without considerable difficulties, but it also shows that the necessities for extending our knowledge of the productions of nature is felt and cheerfully aided, even in the recesses of that vast western wilderness."15

Gever left Fort Vancouver in the Hudson's Bay Company's barque Columbia Nov. 13, 1844, and arrived at London, via Sandwich Islands and Cape Horn, on May 25, 1845.16 His "Notes on the Vegetation and General Character of the Missouri and Oregon Territories, Made During a Botanical Journey from the State of Missouri, Across the South-Pass of the Rocky Mountains, to the Pacific, During the Years 1843 and 1844," was published in The London Journal of Botany, IV-V (London, 1845-46).17 In Vol. VI of this journal there was published a part of a "Catalogue of Mr. Gever's Collection of Plants Gathered in the Upper Missouri, the Oregon Territory, and the Intervening Portion of the Rocky Mountains; by W. J. H." [ooker].¹⁸ The editorial introduction to Geyer's "Notes," presumably written by Sir W. J. Hooker, states: "It is with no small satisfaction we are able to announce to our scientific friends that Mr. Charles A. Gever, who distinguished himself by the Botanical collections he made with Mr. Nicollet in 1838 and 1839, between the Missouri and Mississippi Rivers, has recently arrived in England with a very valuable and beautifully preserved collection of Plants, gathered in the Upper Missouri, on the Rocky Mountains, and in the Oregon Territory ... [Mr. Geyer's sets of botanical specimens are offered to botanists] "at the rate of £2 the 100 species, all expenses included."19

Apart from its scientific value, Geyer's "Notes" contains digressions which give the document some significance as a general source of the early history of the Oregon Country. Lack of space precludes at this time, however, an extensive discussion of it. But I must state more fully my reasons for believing that a close relationship existed between Geyer and Spalding, and that each became interested in the work of the other. Although by the time of Gever's arrival at Clear Water, Spalding had received word that the order of the American Board recalling him from the Oregon Mission had been rescinded, owing to the representations of Dr. Marcus Whit-

The London Journal of Botany, IV, 482-483.

¹⁵ The London Journal of Dolumy, 19, 402-403.
16 Ibid., V, 523.
17 IV, 479-492, 653-662; V, 22-41, 198-208, 285-310, 509-524.
18 VI, 65-79, 206-256. Although the second instalment ends with the notice that the catalogue is "to be continued," there is nothing more in Vol. VII.
19 The London Journal of Botany, IV, 479, 482.

man, nevertheless he was still suffering from a sense of personal injury.²⁰ As he accompanied Gever on botanical excursions through the Nez Perces country, it is not unlikely that he imparted to the botanist his version of the controversy which had threatened to disrupt the mission. At any rate, Geyer begged the indulgence of "the scientific reader" for a lengthy digression made for the purpose of doing "justice" to Mr. Spalding. This consisted of a glowing tribute to the effective work of Mr. and Mrs. Spalding among the Nez Perces, a work which he considered truly remarkable, for he believed that Indian missions generally were failing to civilize the red men.²¹ It is true that Gever by unaided observations might have arrived at a favorable impression respecting the missionary work at the Clear Water station, but the following sentences in his encomium provoke serious reflection: "Mr. S. is by far the most successful Indian Missionary deputed by the American Board of Foreign Missions. Undaunted by the haughtiness of his pupils, he overcomes all obstacles.22 Again he writes: "The American Board of Foreign Missions has committed an error in not aiding Mr. Spalding, or giving and entrusting to his hands the surveillance of all the Missions of that Board in Oregon. They leave him to struggle alone, and consequently the credit and praise belong solely to him."23

Whether this tribute to the Spaldings was a disinterested address to philanthropic readers of a scientific journal, or whether it was written with the expectation that it might be read at the Missionary House in Boston, remains, of course, a matter of conjecture; but at least it indicates a close bond of sympathy between the Spaldings and Gever. In due time Gever's tribute came to the notice of the secretaries of the American Board. Among the papers of the Board is a carelessly written excerpt from this part of Geyer's "Notes," addressed to the Reverend Dr. Rufus Anderson by A. Merwin, who remarked: "I have had the above copied, supposing that Mr. Greene and yourself would be interested in what an Englishman [sic] says of this Mission."24 Mr. Merwin, however, did not think it worth while to have copied the concluding paragraph of Geyer's remarks contrasting the missionary labor at Clear Water with that of Indian Missions in general. This paragraph reads as follows: "The scientific reader will pardon this digression from

²⁰ Spalding to Greene, August 26, 1843-April 8, 1844. The letter is in two parts.
A. B. C. F. M., Letters and Papers, Vol. 248, No. 129.
21 Geyer's account of the missionary work at the Clear Water station is published as a long footnote to his "Notes," The London Journal of Botany, V, 517-518.
22 Ibid., p. 518.
24 A. B. C. F. M., Letters and Papers, Vol. 248, No. 83.

my subject, for I have longed to do justice to Mr. S., and took advantage of this occasion. Those who have travelled in North America, and visited Indian Missions, will be, as I am, aware of their fruitless efforts to civilize the Indians, and of the immense sums squandered liberally by the American citizens for that laudable object. Here was the only place where I found the result propitious, beyond my expectation, and to make that rare case known to philanthropists, is the sole excuse I can offer for this deviation."²⁵

From his intimate association with Geyer it seems clear that Spalding learned not only something of the joy of botanizing, but also that a pleasurable avocation might be made the means of earning some money for the missionary cause. The following letter, written in Spalding's inimitable style, is self-explanatory:

Clear Water, June 6, 1846.

To the Rev. David Greene, Sect. of A. B. C. F. M.

My Dear Sir: I know not what will be your feelings on learning the fact that I have taken tim[e] to make a collection of Flowers & plants, but judge they will be no other than favorable. In fact I bestowed but little time directly upon the effort, but made the collections almost entirely when traversing the Plains, the vallies & hills looking after my cows, horses &c, or as my duties called me to visit the different bands of this tribe at their root grounds, fisheries &c or to different stations of the Mission. Mrs. Spalding did most of the drying in papers. We found it a most pleasing relief to our monotonous labors in our lonely situation. And when examined by a Botanist there may be found some new plants, in fact, although I am not acquainted with the science & therefore can not judge, yet I confidently believe very many of this collection will be found to be new for several reasons; first no Botanist has ever spent a whole season in this vicinity or even in this country & therefore could not collect the flow[er]s which were not in existance at the time of his travels. But I found a new set of flowers showing themselves almost every week & many of very short duration, consequently a Botanist who might make collections in June only would fail of the March & April flowers & could not obtain those which do not show themselves till Aug. Again after visiting the stations of Cimakain, Waiilatpu, as also Walla Walla & several parts of the Nez Perces country & traversing almost every mile square in the vicinity of this

25 The London Journal of Botany, V, 518.

station, I found this to be far the richest field for flowers also that very many of them are confined to comparatively small beds consequently a Botanist passing once or twice through a district would fail could not fall in with all the flowers or have the advantage of one stationary & going out almost every day in different directions. A German Botanist by the name of Geyer was here a fewe weeks in June in the year /44 but many flowers had disappeared & besides he merely traversed this valley & did not visit the numerous vallies & plains around all of which afford some new flowers. Mr. Geyer sent his collection to London. The Renowned Douglass²⁶ did not [sic] come as far up as this. Mr. Breckenridge²⁷ of the American Exploring Squadron passed this place in /40 [1841] but too late in the season & too rapidly to make many collections.

I am no botanist & therefore have made no attempt to describe the flowers except the date of collecting them & their locality. Care should be taken not to disarrange the short notes placed upon each parcel collected at the same date & place. My numerous labors and cares prevented me from bestow[in]g as much labor upon [sic] as they justly required, in fact I could not command time to put them up last fall & now I have been compelled to put them up in to[0] much haste to arrange them properly. I send them to you with the expectation that you will dispose of them as may be thought best. Should they arrive uninjured they will be worth \$5.00 or \$6.00 a hundred i. e. the Botanical Gardens in London offer that price for flowers from this country. I know not how many kinds there are in this collection or how many specimens of each kind of some more & of some less according as they were easily obtained or easily dried. When sold e[a]ch specimen cou[n]ts one & there may be some instances of 50 specimens of one flower which of course counts 50. Should you think best to sell the whole or a part, the profit of course belongs to the Board. I have taken the liberty to send a full set to the National Institute, City of Washington. Should you think best to present a set of specimens to some institution or individual of course you are at liberty as I am a servant of the Board, but the Box should be overlooked & the Plants arranged by a Botanist. This letter although addressed to yourself should accompany the flowers.

Should any Institution or Botanist desire me to make an other collection they will please give me some directions how to put up the plants, & send in a shall [sic] Box a specimen of the flowers re-

26 David Douglas. 27 J. D. Brackenridge.

quired where I have not given the Native name as many of this collection of course will be found to be common.

I made a good collection of seeds but deem it useless to send them by ship as all the seeds from home by sea have failed to germinate & I conclude it will be so with seeds from this country by sea.

Last year there was a very luxuriant growth of plants in the early part of season & I gathered many flowers which have not shown themselves this season.

> With best wishes I am &c H. H. Spalding.²⁸

Several months after Spalding's collection had been put at his disposal, Professor Gray wrote the following letter to Dr. Rufus Anderson:

Cambridge, March 1, 1849.

Rev. & Dear Sir:

A few days ago I had the pleasure of handing you \$35, received for two sets of specimens which I made from the collection of Mr. Spalding, at Clear Water, Oregon. I hope still to realize as much more from them, which I shall duly pay over to the Board. I could have turned these specimens to much better account, and they would have been intrinsically much more valuable had they been better prepared, and packed with more paper. As I trust Mr. Spalding will have opportunity, and be disposed, to make further collections (which I shall be happy to arrange, name, and dispose of for his benefit of [sic] that of the Board, allow me to express to him a lively interest which I feel in the matter, and to say that attention to the folowing points will enable him to make excellent and durable botanical specimens.

1. The thick roots and bulbs, &c, which abound in that region, should be thinned, or one-half cut away with a knife, when the specimen is pressed.—So of thick and hard fruits, which, like the roots, it is very desirable to have.

2. The specimens should be dried as quickly as possible between *numerous* thicknesses of soft, bibulous paper, and under *strong pressure*, as strong as can be applied without crushing. Then they dry more rapidly, keep their color pretty well, and are not fragile; as they otherwise are. While drying the specimens should be changed

28 A. B. C. F. M., Letters and Papers, Vol. 248, No. 133.

I hope you will send him a supply of cheap paper, by first vessel. If you wish I will select and purchase a proper article for the purpose.

Mr. Spalding should also know, that I am able to make a small annual appropriation from the funds of the Botanic Garden for seeds, bulbs, & roots. There will now be overland communication by which packages of seeds can readily be sent home, in autumn. They should be gathered only when fully ripe, in a dry day, dried in the sun for a few hours, done up in paper, and kept in a very dry place until sent.

When the means of communication (over the Isthmus) will allow, I am anxious that Mr. S. should gather, in autumn (or any time after the foliage decays) fleshy roots, bulbs, & tubers—especially of the numerous plants used for food by the natives—pack closely and compactly in *dry moss*, in a close box, and send to me for cultivation. I shall be able to make a proper remuneration.

Will you send to Mr. Spalding the accompanying copy of a memoir, just printed, which contains a few notices of interesting plants from his collection—as far as yet studied—and oblige,

With high regard,

Yours faithfully,

Asa Gray.29

Rev. Dr. Anderson, Secy. A. B. C. F. M., Pemberton Sq.

On March 13, 1849, the Reverend Selah B. Treat, who had succeeded the Reverend David Greene as secretary to the American Board, wrote as follows to the Reverend Mr. Spalding: "Prof. Gray of Harvard University has addressed a letter to Dr. Anderson, a copy of which I send herewith. In accordance with his suggestion, we have purchased four reams of paper, which will be sent to you *via* the Sandwich Islands. The Memoir, mentioned in the last paragraph, will also be sent by the first favorable opportunity. . . ."³⁰

No further letters relating to this episode have been found in the papers of the American Board. In the meantime evil days had come upon the Oregon Mission; the massacre at Waiilatpu occurred

29 A. B. C. F. M., Letters and Papers (Miscl. Dom., 1846-1860), Vol. 270, No. 294. 30 A. B. C. F. M., Indian Letter Book, No. 12, p. 71. on November 29, 1847. Months before Professor Gray had written the letter quoted above, all the stations of the mission had been abandoned, and Spalding, Eells, and Walker, together with their families, had sought refuge in Lower Oregon. It is probable that the massacre marked the end of Mr. Spalding's botanical labors in the Oregon Country.

J. Orin Oliphant