The former figure is in some respects better than Scoresby's, as to form and proportions; but a most singular treatment has evidently been accorded it. The elements of the figure have been transposed, and the belly made to serve the purpose of back, and *vice versa*. It is evident that the figure was copied from a real model, as the baleen is shown correctly, though it projects in one place outside the mouth.

The remaining point relates to the authorship of the volume on whales in the 'Naturalists' library.' The portion of the titlepage of our edition relating to this point reads as follows: "Mammalia — whales, etc. By Robt. Hamilton, Esq., M.D., F.R.S.E., etc."

We now desire to ask our critic how much remains to justify the serious charges which he has caused to be distributed wide-cast over the scientific world, to more or less inevitable damage to institution and person. J. B. HOLDER.

If Dr. Holder is satisfied with the way he has met 'the serious charges,' I am quite willing to here rest the matter; failing, as I do, to see that any of them are materially vitiated by his defence, while, amid the obscurity of much irrelevant matter, all of the more important ones are virtually conceded.

In regard to the authorship of the volume on whales in the 'Naturalists' library,' not only have I, as I have said before, examined anonymous copies of the original edition, and found it given as anonymous in bibliographies, but have seen it attributed by contemporary British cetologists to Jardine. The discovery, however, of a copy by Dr. Holder, having Hamilton's name as author on the titlepage, of course settles the question. J. A. ALLEN.

### Achenial hairs of Senecio.

Mr. Jos. F. James does not know of any explanation of the use of the threads which are projected from the hairs on the achenia of most species of Senecio, etc. Before calling on SCIENCE to help him, he might read up his text-books, say Gray's Structural botany, p. 306. BOTANICULUS.

### Kalmia or rhododendron.

In reply to Dr. Abbott, in SCIENCE for Aug. 17, I will call his attention to the fact that the woods of the kalmia and the rhododendron are quite distinct in appearance, and are not likely to be mistaken the one for the other. The kalmia wood is frequently found in commerce, in the form of handles for tools, such as chisels and the like. The wood is of a very light pink, with darker streaks through it resembling cells filled with woody fibre.

The rhododendron wood is destitute of such marking. As to size, I have seen plenty of the kalmia, four and five inches through the butt, in the mountains of Virginia; and have had in my possession sticks, large enough for any such purpose as the Doctor names, from eastern Pennsylvania. The rhododendron is an extremely rare plant in Chester and Delaware counties, Penn., but the kalmia is common.

S. P. SHARPLES.

Boston, Aug. 22.

## *THE SOCIETY OF MECHANICAL ENGINEERS.*

*Transactions of the American society of mechanical engineers.* Vol. iii. New York, 1882. 350 p. illustr. 8°.

THIS third volume of the transactions of the youngest of the three great societies of engineers in the United States is a well-printed large octavo of over three hundred pages. It contains a list of the officers and members of the society, its rules, the proceedings of the Philadelphia meeting of 1882, and the proceedings at a memorial session in remembrance of Dr. A. L. Holley, a distinguished engineer and a founder of the society. The proceedings at the latter meeting consisted of an introductory address by president R. H. Thurston, in eulogy of the deceased, and a formal tribute to his memory by Mr. J. C. Bayles, the orator appointed by a committee for the occasion. Many members, as well as the appointed orators, paid earnest and eloquent tribute to the great engineer.

Among the more generally interesting and important papers, are those of Professor Egleston, on the appointment of a government commission to test iron, steel, and other metals; G. W. Bond, on the Pratt & Whitney 'standard gauge system;' Professor Robinson, on the thermodynamics of the Worthington pumping-engine; an essay on the progress of engineering science from 1824 to 1882, by Mr. Fraley of the Franklin institute; the windmill as a prime motor, by Mr. Wolff; and a long paper on the several efficiencies of the steam-engine, by Professor R. H. Thurston.

Professor Egleston gives a history of a movement among the engineers and scientific and business men of the country, to secure the establishment of a permanent commission to determine, by direct investigation, the absolute and relative values of constructive materials in the United States. Under the lead of the Society of civil engineers, such a commission was demanded by a very large number of the leading men of the country, and was created by act of Congress in the year 1875. It consisted of Col. Laidley, Gen. Gilmore, Com. Beardslee, Chief-engineer Smith, Dr. A. L. Holley, and Professor Thurston, the latter acting as secretary. This commission, in the course of two years, working amidst many discouragements, did an enormous amount of work; the results of which are published in a report consisting of two large and fully illustrated volumes recently issued from the government press. The commission was not well sustained. Congress refused to continue its appropriations; and it ceased to exist, despite the protest of all the leading technical societies, polytechnic schools, the principal colleges, and such associations as that of the iron and steel makers. The effort is now making, to revive this commission, and to secure the continuance of its work. The publication of the enormous mass of information acquired by the board during the period of