

as the willingness to bear privation cheerfully.

A man who takes up forestry will often find the field work exceedingly or even unexpectedly hard, for it combines severe mental work with severe bodily labor, under conditions which make each one peculiarly trying. Work in the woods differs profoundly from camp life as it is usually understood. Foresters get a certain amount of hunting and fishing, and every forester will do his work better for a whole love of the rod and gun, but the line between work and play is still sharply drawn.

I have been speaking of the fundamental qualities which are more or less necessary to success in any vigorous outdoor life. There are several additional capacities with which the forester should be well endowed. The first of these is the power of observation. It is often difficult to say *a priori* whether a man has it or not. In many cases it makes itself known as a love of hunting or fishing, or a general pleasure in all outdoors. To the forester it is one of the most essential qualities in his mental equipment. Finally, perseverance, initiative and self-reliance are peculiarly necessary, because the forester is so often withdrawn from the inspection of his superiors and altogether dependent on his own steadfastness and devotion to keep him up to the high standard he should set himself for his work. In a new field of effort this is especially likely to be true. It is one of the distinguishing characteristics of the profession of forestry.

PREPARATION.

The preparation for forestry as a profession should, as a rule, begin with a college or university course, and should be continued after graduation in most cases for three years. The more important auxiliary subjects are:

(1) Botany, especially as it relates to the life and structure of plants.

(2) Geology, with special emphasis on the origin and meaning of the surface features of the earth, thus including physical geography.

(3) Some knowledge of Chemistry and Physics, and if convenient, some Zoology and Entomology as well.

(4) Mathematics, including Geometry and Trigonometry, and a good working knowledge of surveying.

(5) Some knowledge of Law and of business methods.

(6) French or German, preferably the latter, and still better, both.

(7) A good course in Economics.

(8) The History and Geography of the United States, with special reference to its economic development and its present economic status.

(9) Meteorology.

The first step in the preparation for forestry as a profession is for the possible forester to discover whether his conception of forestry is a right one. To do so he must get into the field. The Division of Forestry has made provision to meet this requirement by establishing the grade of Student-Assistant, with pay at the rate of \$300 a year. Men who take this position are required to assist in the work of the Division with the same steadiness and devotion to duty as all its other members, and they are employed so far as possible in work of peculiar value to them and at the same time of use in the general progress. All their expenses are defrayed while in the field. In addition to the specific advantage this grade offers in enabling a man to take part in actual forest work under a trained forester, and so discover what the profession really means, it has a special usefulness in enabling men who cannot afford fuller preparation to support themselves while getting their education. It does not replace a forest school with advantage, nor is the intention that it should. No future forester who can possibly afford to take a course, either at Cornell, under Dr. Fernow, or at Biltmore, under Dr. Schenck, should fail to do so.

POSITIONS OF STUDENT ASSISTANT.

The number of positions as Student Assistant is decidedly limited. Parties will be in the field during the coming Summer in the Adirondacks, in the State of Washington, and possibly also in Maine. No one will be received

as Student Assistant who has not definitely made up his mind to take up forestry as a profession, although of course no pledge to that effect is required.

In my judgment the best course for the future forester to pursue, so far as his systematic training is concerned, is first, one year at a university, filling up the blanks in the auxiliary subjects mentioned above; second, a year at a forest school, preferably where practical work in the woods goes hand in hand with theoretical instruction; and third, a year abroad. The latter is of the greatest value, because in this country forestry is too young to show the effect of silvicultural treatment on the various forests; although much that is learned abroad must be unlearned later. This experience in a region where forestry is of old date is, in my judgment, a most essential portion of a forester's education. It goes without saying that vacations, as far as possible, should be spent in the woods.

Forestry on its executive side is closer to lumbering than to any other calling, and a good knowledge of the lumberman's methods is an essential part of a forester's education. But it must not be forgotten that it offers a field for pure research of the widest and most attractive character for those who are inclined and can afford to occupy it. It is so broad a subject that as yet, we do not quite know what its development and its subdivisions are going to be.

New York University Club.

The new club house of the University Club, No. 1 West 54th st., will be opened for the use of members on Wednesday evening, May 17, at nine o'clock. Supper will be served later. The privilege of inviting visitors is suspended for that evening.

The following is a complete list of the Clubs which have extended the courtesies of their houses to the members of the University Club during the interval of removal:

Metropolitan Club; Union League Club; Century Association; Calumet Club; Lotos Club; New York Club; Riding Club; Racquet and Tennis Club; Hamilton Club; Players' Club; Harvard Club; Transportation Club; Aldine Association; Engineers' Club,

Spring Regatta.

The annual Spring Regatta of the class and scrub crews will be held at Lake Whitney, Saturday afternoon, May 20. The scrub crews will row over the short course and the class crews over the mile and one-quarter course. The members of the winning crews will receive banners, and the numerals of the winning class crew will be placed upon the Scranton Challenge Cup. The scrub crews, entered for the Regatta, are Harlequin, Gentlemen's Eight, Coystrel, Welch Hall and Favonian. In the class races, the Junior, Sophomore, and First and Second Freshman crews are entered.

One of the features of the regatta will be a race between the first and second University Crews over the mile and a quarter course.

Divinity School Commencement

President Stryker of Hamilton College delivered the anniversary address to the Divinity School, in Center Church, on Sunday evening, May 14. Exercises on Commencement Day begin at 10.30 A. M., Wednesday, May 17, with the addresses by members of the graduating class, in College Street Hall.

At 1 o'clock the Alumni Association dinner will be given in the Chapel of the United Church, on Temple street. A number of informal addresses will be delivered.

A reception for the alumni and their wives, the members of the graduating class, and friends of the seminary will be held in the Lowell Mason library room, from 4.30 to 6 o'clock.

Twenty-one men will graduate this year.

The New England Intercollegiate Athletic Association will hold its annual meeting at Worcester, Mass., May 27.

MORE GRADUATE FIGURES.

Professions and Business—Locality.

[Reprinted by permission from May number of the Yale Review.]

The movements of no class of people in the community are more carefully recorded than those of the American college graduates. This is especially true of the graduates of Yale College, whose whereabouts and occupations are the basis of the successive Class Secretaries' Reports, the high statistical value

of which we owe to the persistency and intimate relations of the class system in the Academic Department of that University.

During the ten years, 1883-1892, 1,468 men were graduated from the College. The birthplace, permanent residence and permanent vocation of almost all of these is on record; also the vocation of four-fifths of their fathers. The distribution among the different professions and occupations in the case of both the fathers and the sons is indicated in percentages of all the fathers and sons where records are obtainable, as follows:

| OCCUPATION OF | FATHERS; | SON. |
|---|----------|-------|
| Law..... | 19.3% | 34.4% |
| Ministry..... | 10.1 | 6.7 |
| Medicine..... | 5.2 | 9.2 |
| Teaching and Science..... | 2.9 | 12.5 |
| Learned Professions (and college graduates in the case of the fathers)..... | 37.5 | 62.8 |
| Business..... | 50.7 | 30.0 |
| Engineering..... | 0.7 | 1.2 |
| Journalism and Letters..... | 1.3 | 2.8 |
| Farm, Plantation or Ranch..... | 8.0 | 0.7 |
| Government Service..... | 1.0 | 0.8 |
| Miscellaneous..... | 0.7 | 1.7 |
| | 99.9 | 100.0 |

In an earlier number of the *Yale Review* (for November, 1898), an analysis of the occupations of the graduates of Yale College was given. Some of the facts there noted are further emphasized by the above table. The fraction of ministers among recent graduates has fallen from a much larger figure to 6.7%. A larger fraction of the fathers of these graduates, namely 10.1%, were ministers. Their sons evidently turned to other professions.

Much the same is true of the farmers and planters. 8 per cent. of the fathers were so occupied. But of the above generation of college graduates less than 1% devoted themselves to agricultural pursuits. In the case of business occupations, half of the fathers were business men (merchants, bankers, manufacturers, brokers, etc); of the sons, less than one-third were; a striking fact when we recall that in earlier times the college education was almost exclusively a preparation for a professional career, which was pursued so largely by the sons of professional men. Of recent graduates, as is seen,

something less than two-thirds devote themselves to a learned profession (law, medicine, ministry, teaching or science). But of the fathers, only 37.5% belonged to the learned professions or had enjoyed a collegiate education. A large majority, nearly two-thirds of collegiate graduates of recent times, at Yale College at least, are sons of fathers who have enjoyed neither an academic nor a professional education. The college men of to-day are selected from a much broader area, geographically and professionally, than were those of earlier times. The hereditary aristocracy of college graduates is a thing of the past.

As to the profession of teaching and the pursuit of science, the fraction has steadily risen till it reaches 12.5% among the graduates of the above ten years; while of the fathers only 2.9% were teachers or scientific men. We must defer the examination of the question whether this result must be ascribed to the growing attractiveness of the teacher's profession (in the case of the sons); or to the unremunerativeness of the profession and inability (on the part of the fathers) to send sons to college.

FATHERS' OCCUPATION, BY SECTIONS AND IN PERCENTAGES.

| | Law. | Ministry. | Medicine. | Teaching and Science. | Learned Professions (Col. 1-4) and College Graduates. | Business. | Farm and Plantation. |
|---------------------|------|-----------|-----------|-----------------------|---|-----------|----------------------|
| New England..... | 14.6 | 13.1 | 5.5 | 3.3 | 40.0 | 47.8 | 11.7 |
| Middle Atlantic.... | 19.1 | 7.9 | 6.6 | 2.6 | 42.7 | 55.6 | 3.6 |
| North Center..... | 26.0 | 6.7 | 3.3 | 4.7 | 48.0 | 52.7 | 2.7 |
| South Atlantic.... | 26.7 | 6.7 | 13.3 | --- | 58.8 | 26.7 | 6.7 |
| South Center..... | 46.2 | --- | 3.8 | --- | 53.8 | 30.8 | 11.5 |
| Mountains..... | 50.0 | --- | --- | --- | 50.0 | 25.0 | --- |
| Pacific..... | --- | --- | 25.0 | --- | 33.3 | 50.0 | 25.0 |
| Foreign..... | 5.0 | 25.0 | 5.0 | --- | 38.1 | 65.0 | --- |

The above table classifies the fathers by geographical sections and by occupations. The minor occupations included in the first table are here omitted. In the divisions of the country, the Middle Atlantic States include New York, New Jersey, Pennsylvania and Delaware; the South Atlantic States, those from Maryland and West Virginia to Florida inclusive; the South Central States include Kentucky, Tennessee, Alabama, Mississippi, Arkansas, Louisiana, Indian Territory, Oklahoma, and Texas; the North Central States, those north of the last division; the Mountain States and Territories, the remaining ones except the tier of Pacific States. The figures for the Mountain and Pacific States in the above table must be neglected, as they are based on too few data.

As would be expected, farmers and planters are more numerous represented among the fathers of the Southern and New England students than among those of the Middle Atlantic and North Central students. This preponderance of farmers in New England must of course be due to the educational facilities and traditions of that section; that of planters in the South must be due to the fact that they still constitute, not as of old, the bulk, but at least a considerable part of the well-to-do class.

It is, moreover, noticeable that the

learned professions and college graduates are most strongly represented among the fathers of Southern students, while in the North Central section the percentage falls to 48%; in the Middle States, to 42.7%; and in New England, to 40%. Correspondingly, business men are least numerous among the fathers of Southern students, and most numerous among those of North Central and Middle States students. It is among the latter that lawyers also predominate. A comparison of the type of fathers in New England and in the North Central States who have sent their sons to college is interesting. In New England roughly half the fathers were business men; of the rest the law, the ministry and the farm are about equally represented, while medicine and teaching occupy a less prominent place. In the North Central States a trifle more than half the fathers were business men; one-fifth were lawyers; the ministry sinks to half the importance it had in New England; farming to one-third the importance; while medicine and teaching occupy about the same position that they do in New England.

Another subject upon which the statistics of Yale College graduates throw much light is the interstate movement of population. The following figures give the place of birth and the place of permanent residence of approximately all the graduates of the years 1883-1892: