

SCIENCE

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RESEARCH IN STATE UNIVERSITIES.*

THE word research, as used by scientific men, signifies study systematically carried on for the purpose of discovering that which is unknown. It is the seeking for new facts, new forces, new laws and new ideas without direct reference to their utility.

The word *re*-search has been chosen to express this high aim, rather than the same root without the prefix, because in most instances explorations have to be repeated, experiments performed again and again, and the advances made in any direction scrutinized from many points of view before the conclusions reached are deemed worthy of acceptance.

The field of research is not restricted to the laboratory or the library, but is as wide as the universe. It includes the study of man as well as his environment. It is essential alike to the growth of industries and the development of philosophies.

Research, then, is the painstaking endeavor to increase the world's store of knowledge in any department of human thought.

The Scope of Research.—One of the most important results of the modern development of industries is the recognition of the fact that discovery is the mainspring of progress. This conclusion, although self-evident, does not seem to have received the recognition it deserves. The creed which needs to be repeated over and over again in the hearing of every intelligent human

MSS. intended for publication and books, etc., intended for review should be sent to the Editor of SCIENCE, Garrison-on-Hudson, N. Y.

* Read before the Research Club of the University of Michigan, January 20, 1904.