PREFACE.

THE HALSTED STREET LIFT-BRIDGE describes one of the most unique structures in America, and, while it is improbable that another bridge of that type will ever be built, owing to the later development of the baseule bridge, many of the devices employed are valuable, and the structure will be of especial interest to the student of movable bridges.

FOUNDATIONS FOR IMPORTANT BUILDINGS IN THE CITY OF MEXICO describes a novel method of distributing the weight of a building when the supporting earth has very small bearing value.

SPECIFICATIONS is always an important subject for the engineer engaged in any capacity on any kind of work; consequently, no apology is needed for the insertion of this broad and thorough lecture.

The paper on The FLOW-LINE BRIDGE REPAIRS reads like a story and would be interesting as such, but it is important as a description of a piece of difficult engineering done in great haste and under dangerous circumstances.

THE RELATIONS OF CIVIL ENGINEERING TO OTHER BRANCHES OF SCI-ENCE was written very recently and contains a broad view of the field of science, with special reference to the relative position of civil engineering.

Special acknowledgment is due the American Society of Civil Engineers for permission to republish the three papers which appeared originally in the Society's Transactions, and to its Secretary, Mr. Charles Warren Hunt, for kindly assistance in obtaining electrotypes of the cuts for these papers.

To Dr. Waddell I am indebted for permission to publish the papers and for many valuable suggestions.

JOHN LYLE HARRINGTON.

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