



Ain Shams University,
Women's College for Arts,
Science and Education,
Cairo- Egypt.

Study the Effect of Some Surfactants on the Properties of Cement Pastes

A Thesis

Submitted to Chemistry Department,
Women's College, Ain Shams University
In Partial Fulfillment of The Requirements For The
Degree of Ph. D. of Science

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Cairo- Egypt
2015

بِسْمِ اللَّهِ الرَّحْمَنِ الرَّحِيمِ

قَالُوا سُبْحَانَكَ لَا عِلْمَ كُنَّا إِلَّا مَا عَلَّمْتَنَا
إِنَّكَ أَنْتَ الْعَلِيمُ الْحَكِيمُ

صَلَّى
الْعِظِيمُ

سورة البقرة
(32)

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ACKNOWLEDGMENT

First and foremost, all praises are due to “Allah” the almighty, who gave me the opportunity to accomplish this research and made me overcome all circumstances, Alhamdulillah. Secondly, the Peace and Blessings of Allah be upon our Prophet Muhammad, and upon His Family and Companions. Thirdly, thanks are due to many great people who have contributed towards the successful completion of this work in one way or another.

I wish to extend my appreciation, gratitude and sincere thanks to my advisors: *Prof. Dr. Wafaa S. Hegazy, Prof. Dr. Shafik M. Jendia, Dr. Faten Z. Mahmoud and Dr. Maha R. Mohamed* for their immense support, their kind help, talented supervision and criticism, useful directions, valuable and fruitful discussion during all steps of the study.

I would like to submit my gratitude, sincere thanks and appreciation to all academic, technical and official staff in Chemistry Department, Women's College, Ain Shams University, **for their kind and sincere supports.**

I would also like to extend my thanks to the engineering lab staff in the Islamic university for their generosity and technical assistance.

Special thanks are expressed to my wife, family and friends for their love and support. They may not understand what I am working on, but somehow they still tell me it is great. They have been with me from the beginning and will have to deal with me until the end. For all this I am incredibly thankful.

Also, I would like to express my appreciation to the members of the Thesis Evaluation Panel for their time, invaluable comments and suggestions.

NOTE

Beside the work done in this thesis, the candidate has attended preliminary Ph.D. courses in inorganic and analytical chemistry including the following topics:

- Inorganic reaction mechanism.
- Different types of cement and their applications.
- Comprehensive exam in inorganic and analytical chemistry.
- Test of English language proficiency (TELP).

He has successfully passed written examinations in the above mentioned topics.

Head of Chemistry Department

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