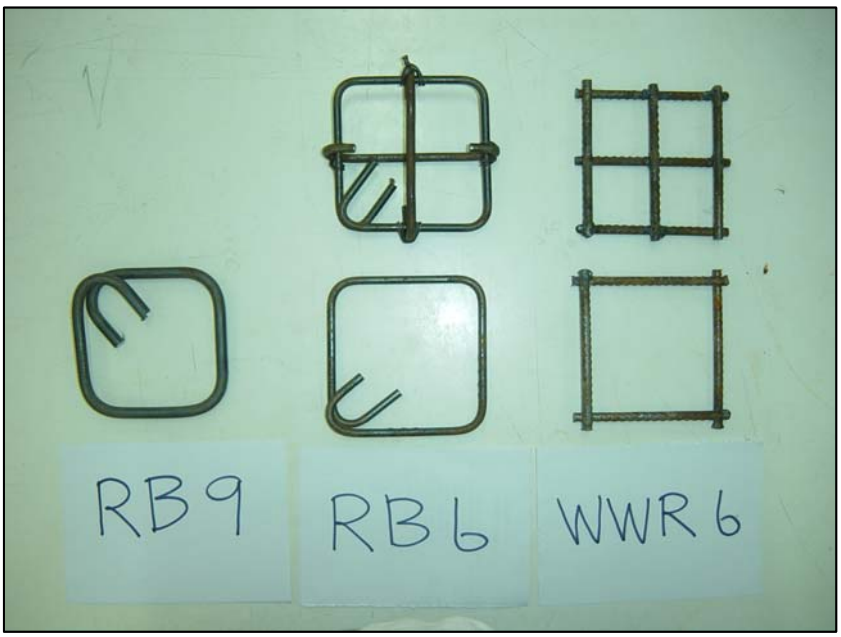
Appendix D
Materials preparation

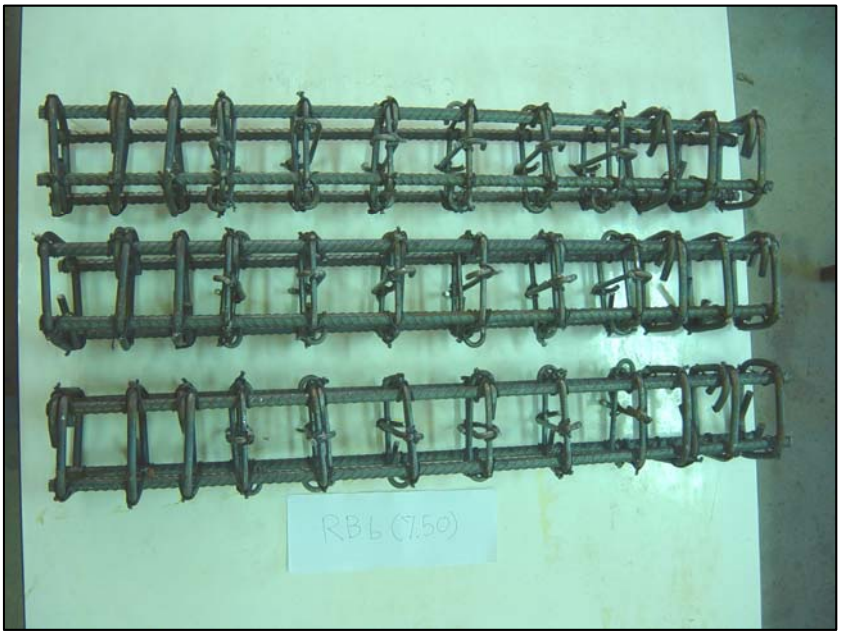
Specimen preparation

1. Preparation of transverse reinforcement

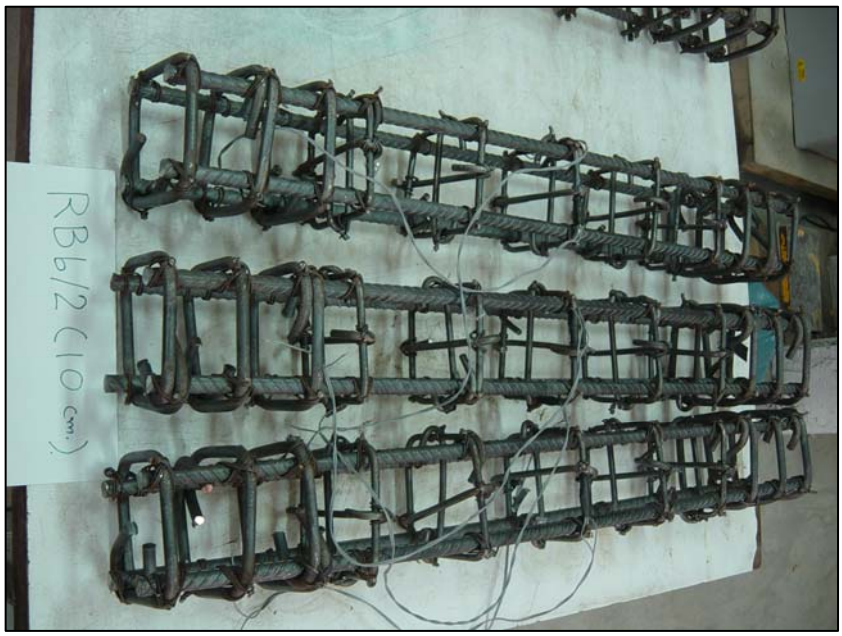


Appendix Figure D1 Transverse reinforcements are used for testing.

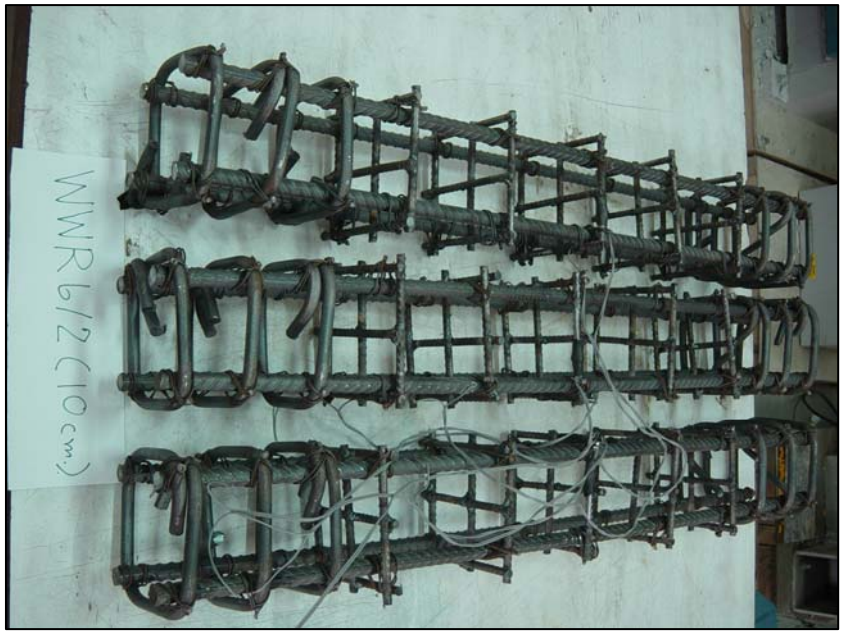
2. Preparation of reinforcement bar



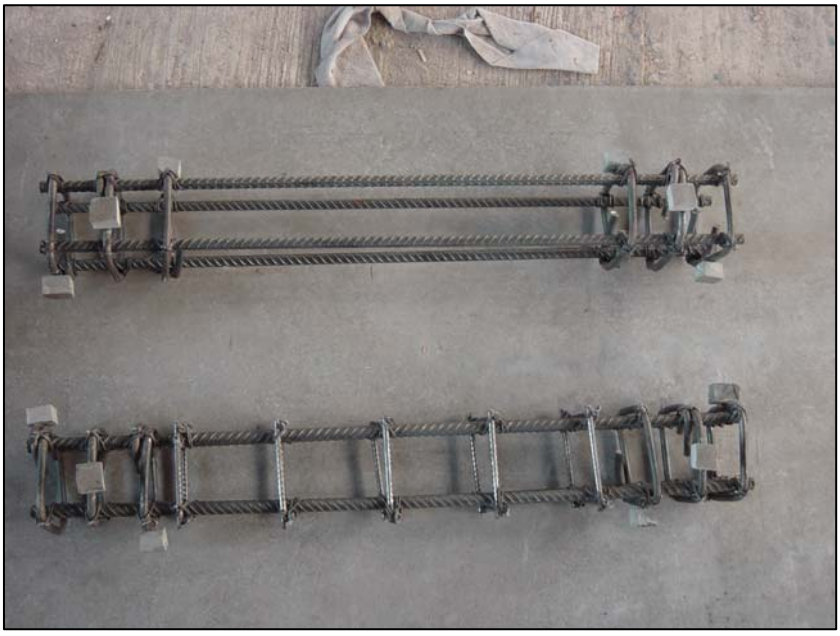
Appendix Figure D2 Transverse reinforcements bar, RB6(7.5)



Appendix Figure D3 Transverse reinforcement bar, RB6(10)



Appendix Figure D4 Transverse reinforcement bar, CDR6/2(10)

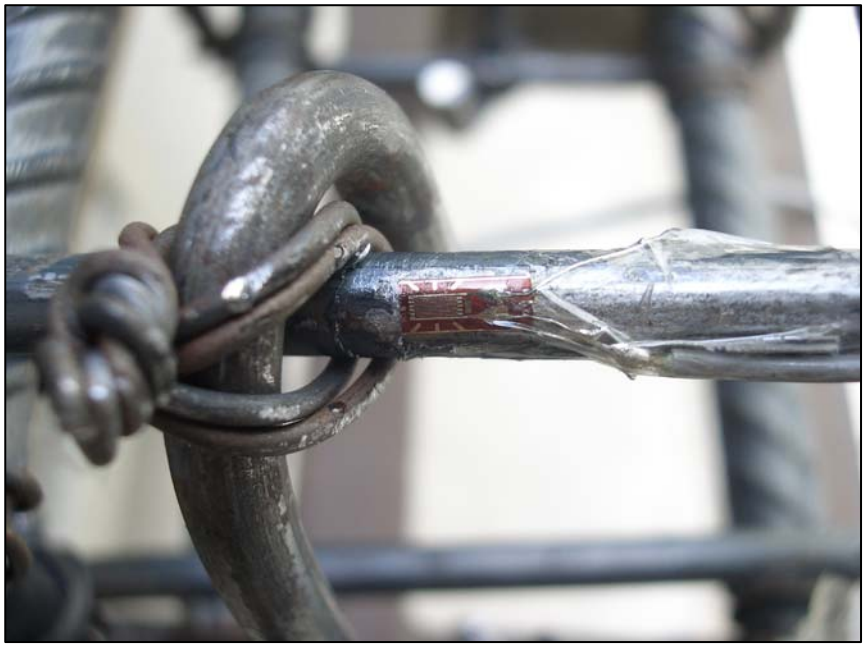


Appendix Figure D5 Transverse reinforcement bar, CDR6/1(10) and No Tie

3. Strain gage type KC-60-120A1-11L1M2R

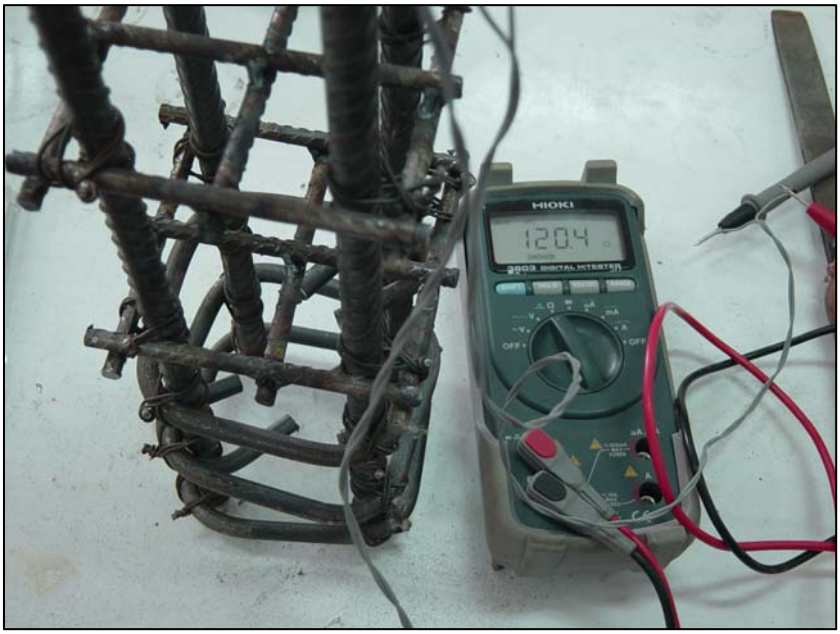
Appendix Figure D6 Strain gage's package

4. Strain gages are installed to transverse reinforcement



Appendix Figure D7 Strain gages installed

5. Connectivity check



Appendix Figure D8 Connectivity check

6. Prepare standard cylinder mold

Appendix Figure D9 Standard cylindrical mold

7. Specimens ready for casting concrete

Appendix Figure D10 Preparation of formwork

8. Prepare materials

Appendix Figure D11 Materials preparation

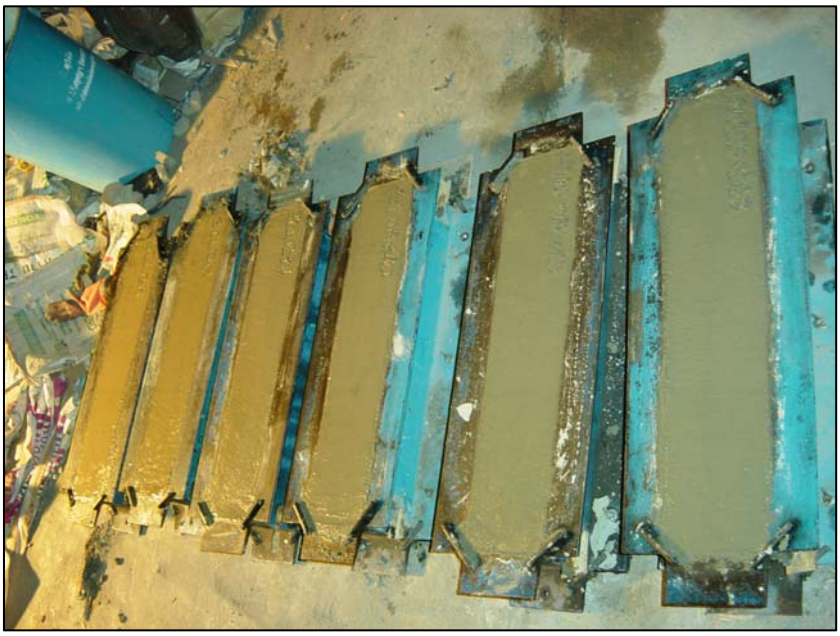
9. Mixing machine

Appendix Figure D12 Mixing concrete

10. Casting concrete and vibration

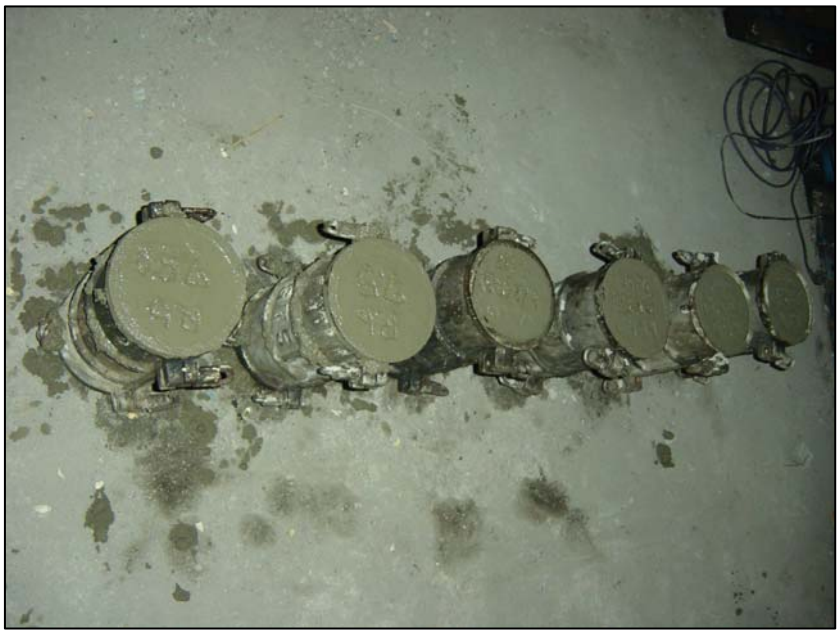
Appendix Figure D13 Casting concrete

11. Concrete cast in formwork



Appendix Figure D14 Concrete cast in formwork

12. Concretes were cast in standard molds



Appendix Figure D15 Concrete cast in standard molds

13. Removed formwork and preparing for LDVT

Appendix Figure D16 Preparation for LDVT

13. Curing

Appendix Figure D17 Curing

14. The both ends of specimens were capped with sulfur compound

Appendix Figure D18 Capped with sulfur compound

15. The both ends of specimens were capped with sulfur compound

Appendix Figure D19 Cylindrical specimens for compressive test

Appendix E
Material and Equipment

Material and Equipments for Experiment

1. Set up instruments and specimen

Appendix Figure E1 Material and Equipment no.1

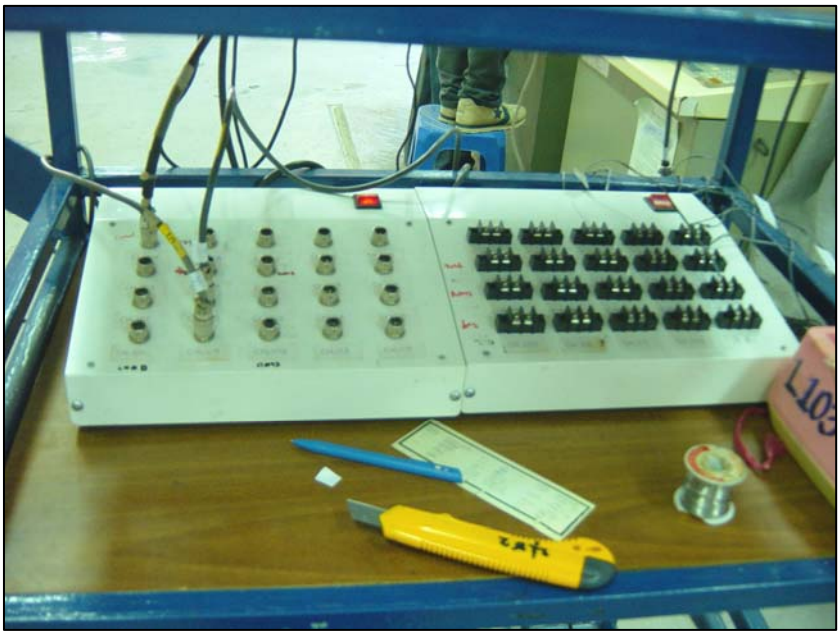
2. Personal computer for data record

Appendix Figure E2 Material and Equipment no.2

3. Data logger

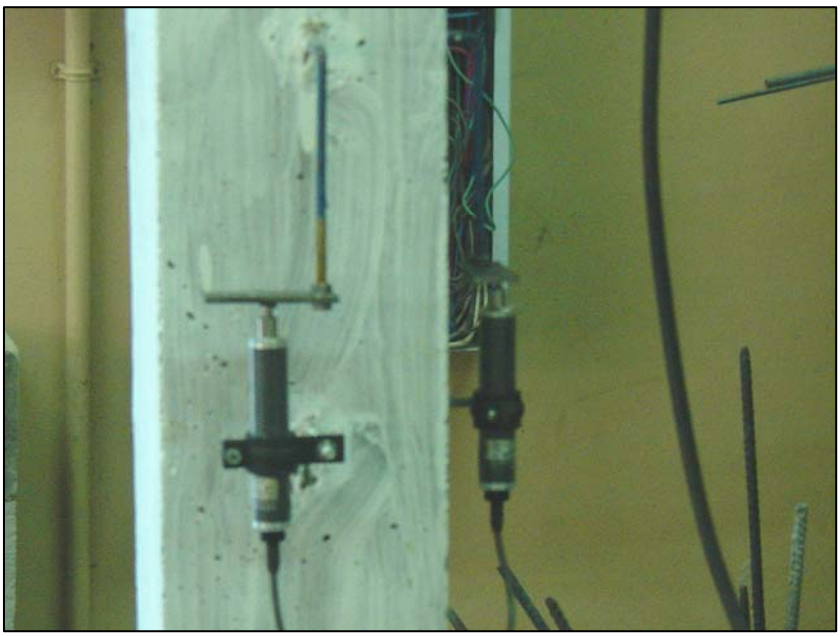
Appendix Figure E3 Material and Equipment no.3

4. Transducer



Appendix Figure E4 Material and Equipment no.4

5. Set up LDVT



Appendix Figure E5 Material and Equipment no.5

6. Set up dial gage for steel tensile test

Appendix Figure E6 Material and Equipment no.6

Appendix Figure E7 Material and Equipment no.7

7. Around 60 – 80 % of peak load will occur tidal crack

Appendix Figure E8 Tidal crack

8. Failure surface made visible.

Appendix Figure E9 Visible crack

9. Failure surface was made visible by removing the loose cover of concrete

Appendix Figure E10 Final stage