

5. Pisac

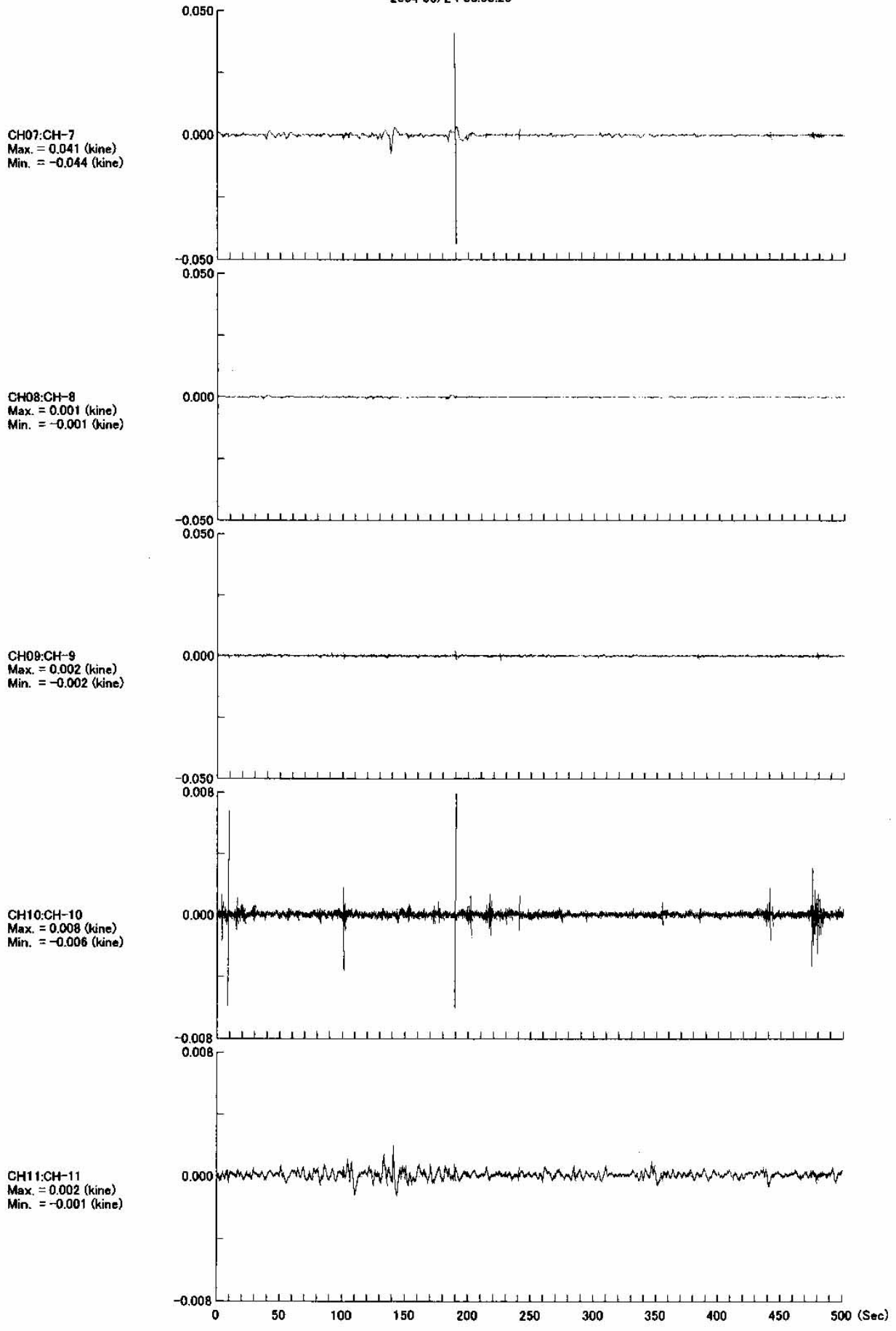
5.1 Typical construction: Structure vibration



One of the typical constructions in the zone of the Intihuatana in the ruins of Pisac, was selected for microtremor measurements. Horizontal vibrations in the two principal directions of the building were performed. The sensors were located on the floor level and on walls on all four sides. The sensors at the wall were located at the top central part of each wall. The directions were designated as NS and EW, which correspond approximately to the actual orientation of the walls. In the photograph the wall face corresponds approximately to the east-west direction. The time domain plots from the results of the measurements are shown in the following figures.

27 PISAQ-STRUC-NS

2004 06/24 03:05:25 04 06 24 03 05 25 04 06 23 13 05 25

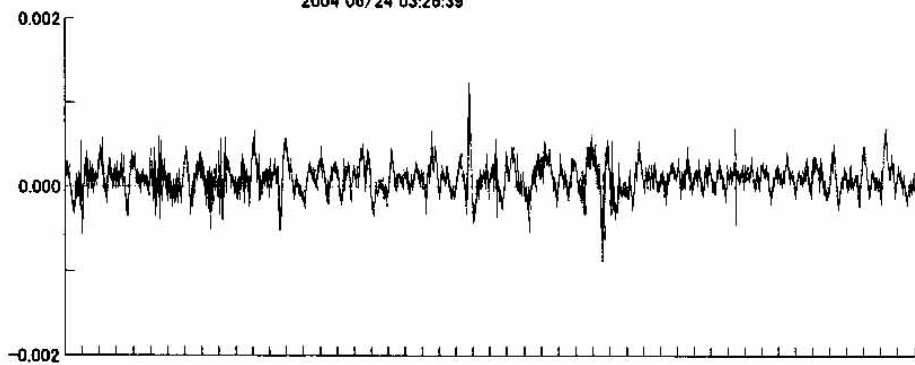


28 PISAQ-STRUC-EW

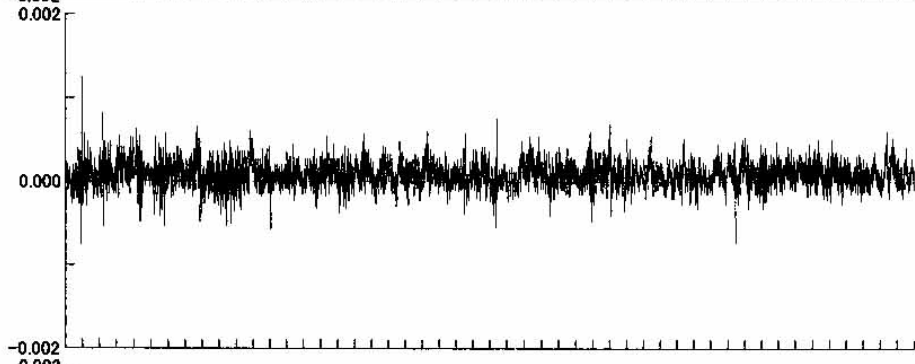
04 06 24 03 26 39 04 06 23 13 26 39

2004 06/24 03:26:39

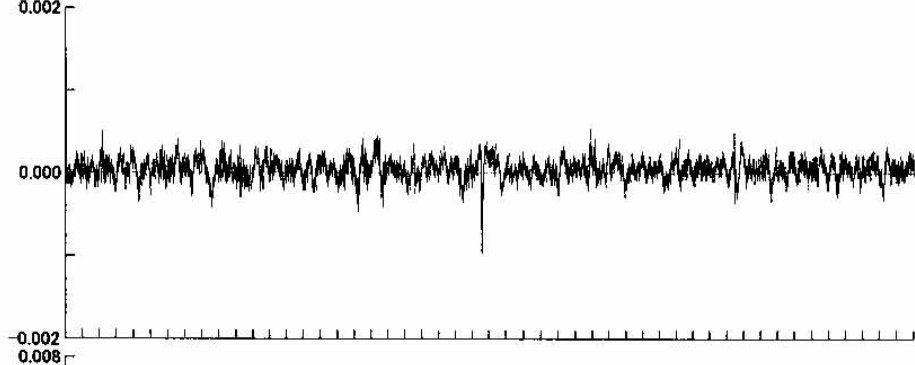
CH07:CH-7
Max. = 0.001 (kine)
Min. = -0.001 (kine)



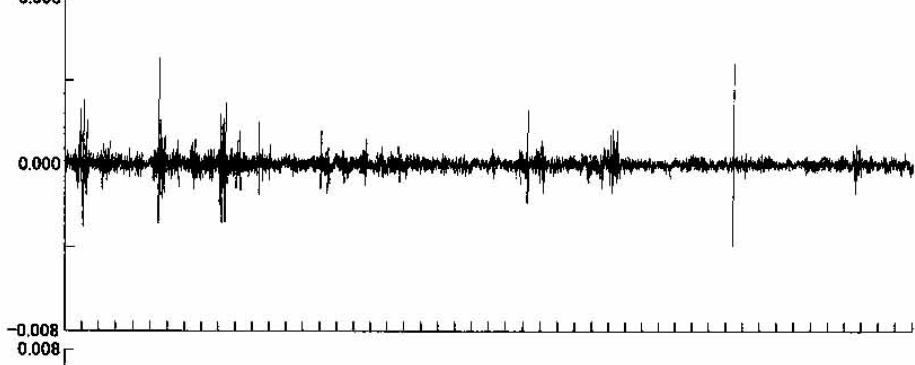
CH08:CH-8
Max. = 0.001 (kine)
Min. = -0.001 (kine)



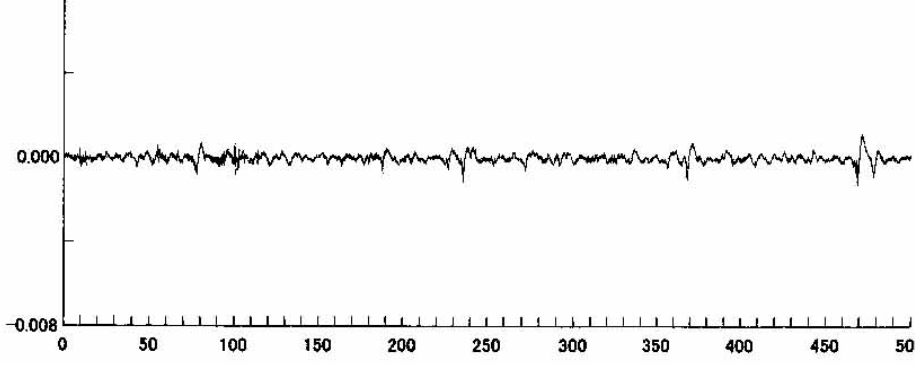
CH09:CH-9
Max. = 0.001 (kine)
Min. = -0.001 (kine)



CH10:CH-10
Max. = 0.005 (kine)
Min. = -0.004 (kine)



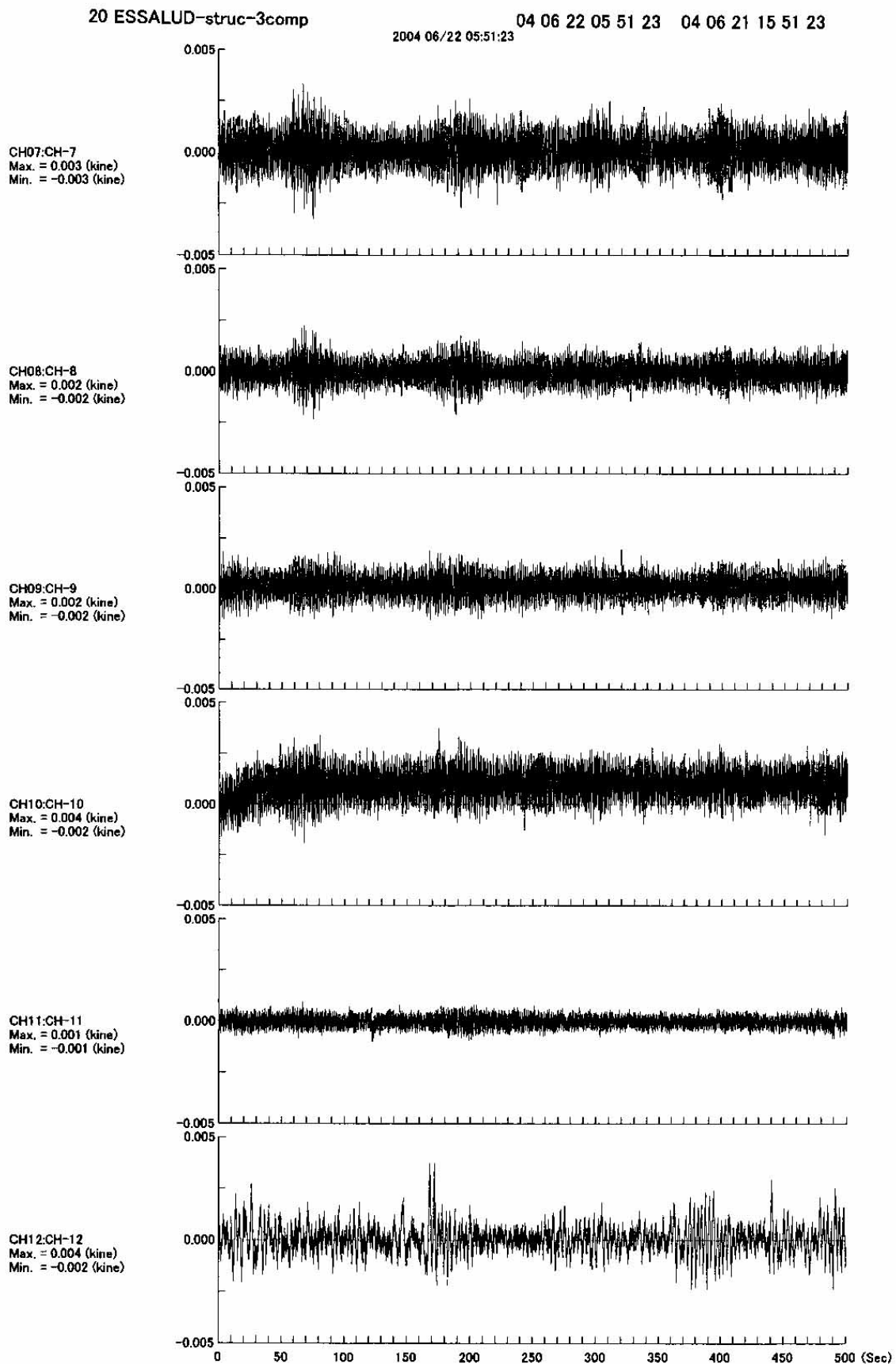
CH11:CH-11
Max. = 0.001 (kine)
Min. = -0.001 (kine)



0 50 100 150 200 250 300 350 400 450 500 (Sec)

Additional measurements

1) One building unit of the Hospital ESSALUD of Cusco: Structure vibration

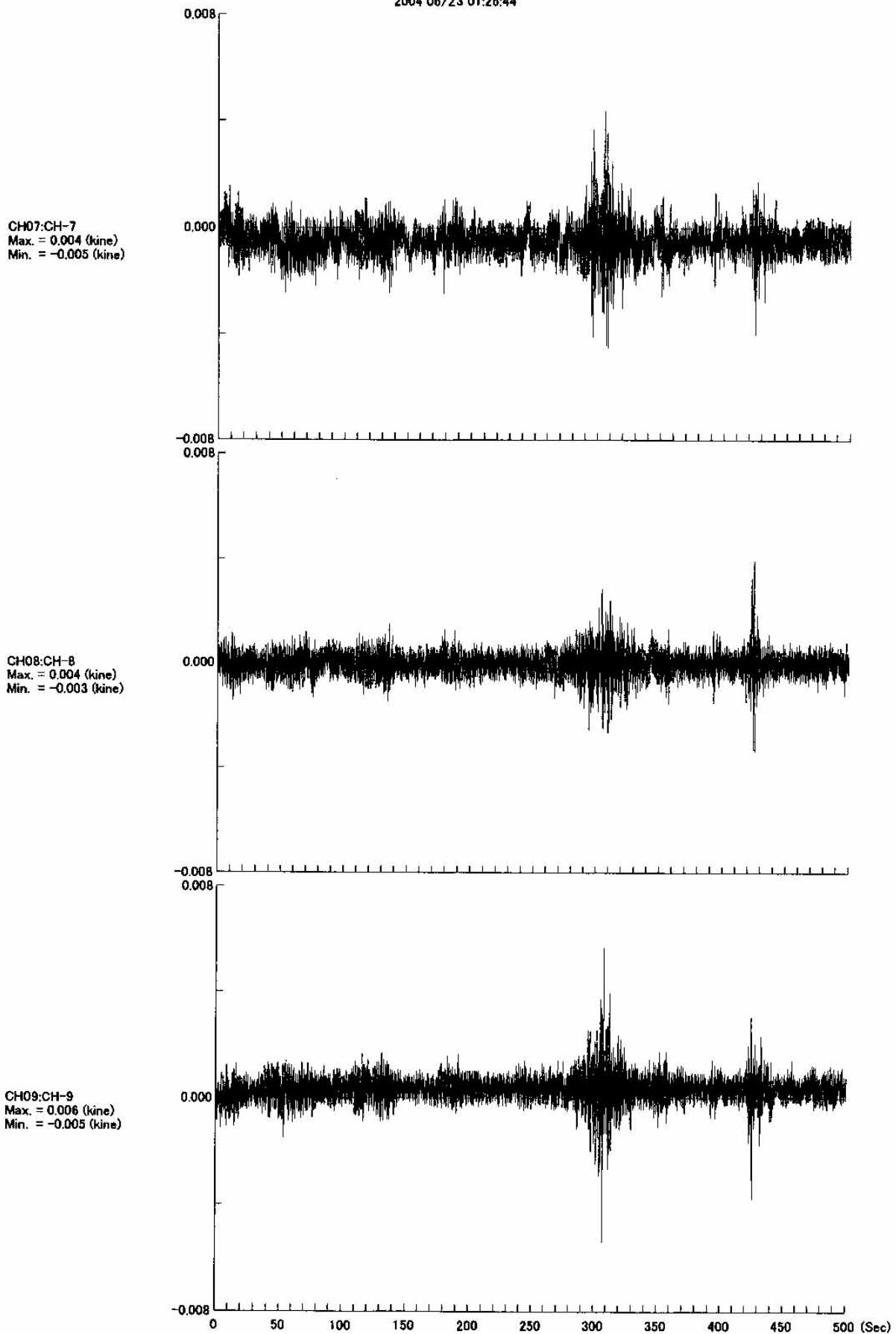


2) Ground vibration measurement at National University of Cusco

23 UNSAAC-SOIL-3comp

04 06 23 01 26 44 04 06 22 11 26 44

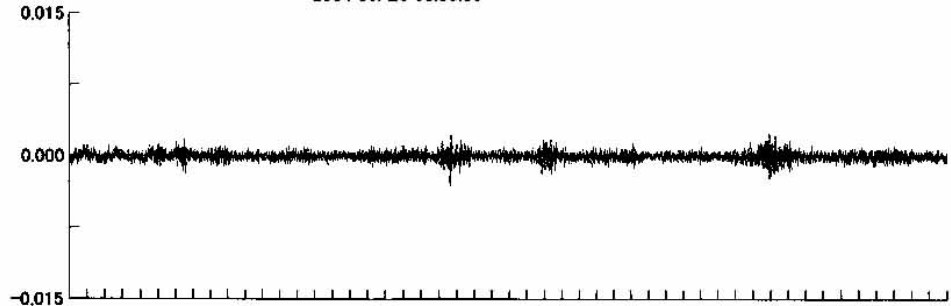
2004 06/23 01:26:44



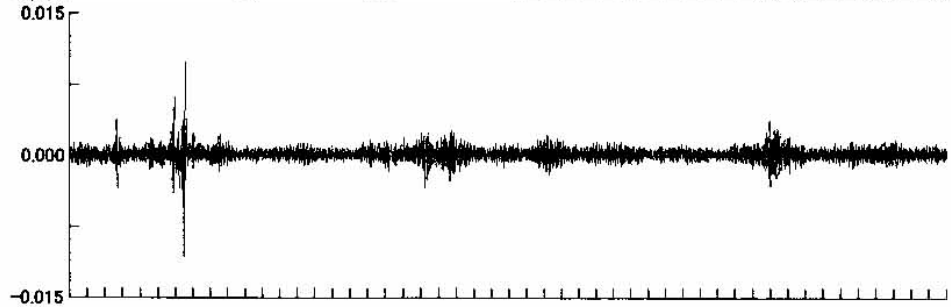
21 UNSAAC-FK-1measure

2004 06/23 00:55:00 04 06 23 00 55 00 04 06 22 10 55 00

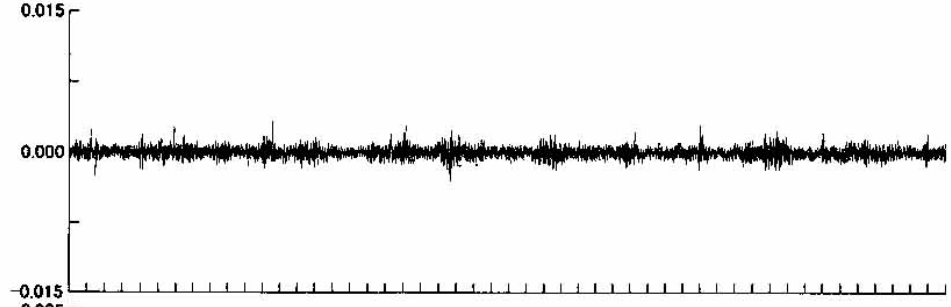
CH07:CH-7
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Min. = -0.003 (kine)



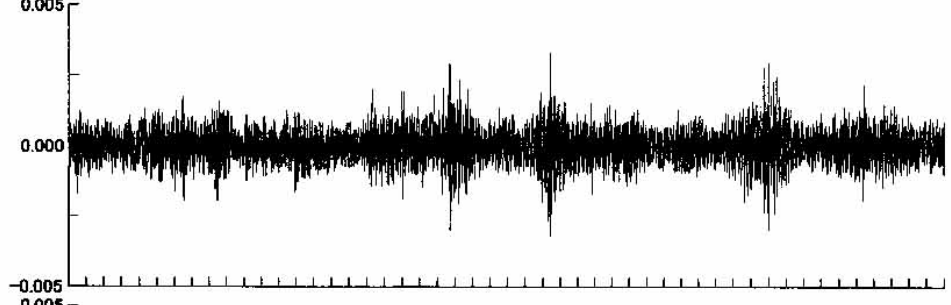
CH08:CH-8
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Min. = -0.011 (kine)



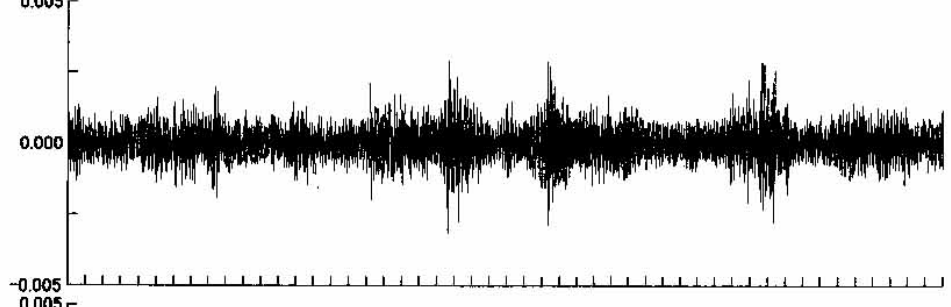
CH09:CH-9
Max. = 0.003 (kine)
Min. = -0.003 (kine)



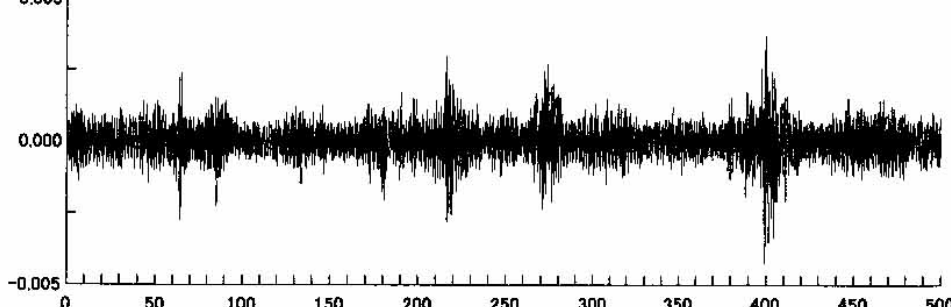
CH10:CH-10
Max. = 0.003 (kine)
Min. = -0.003 (kine)



CH11:CH-11
Max. = 0.003 (kine)
Min. = -0.003 (kine)



CH12:CH-12
Max. = 0.004 (kine)
Min. = -0.004 (kine)

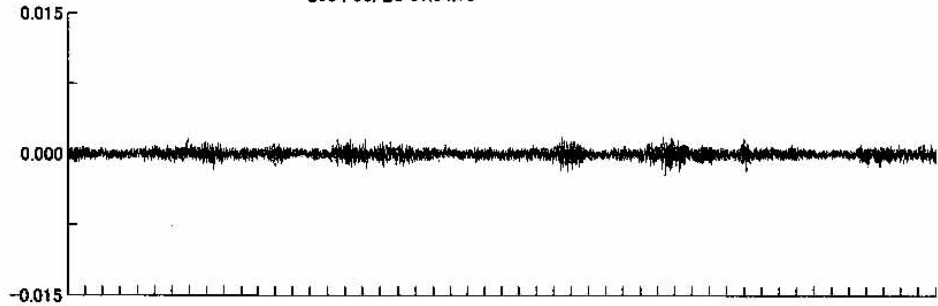


0 50 100 150 200 250 300 350 400 450 500 (Sec)

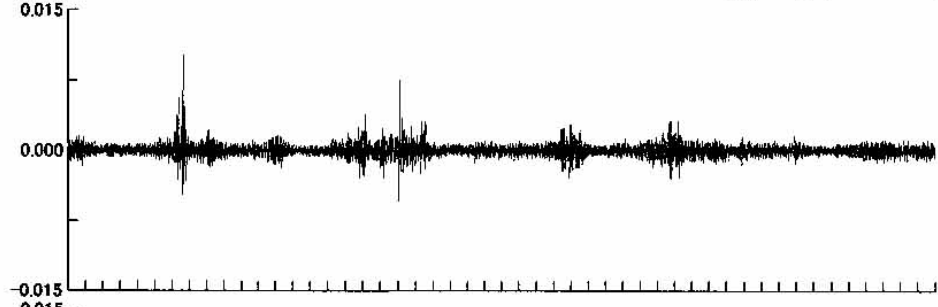
22 UNSAAC-FK-2measure

04 06 23 01 04 16 04 06 22 11 04 16
2004 06/23 01:04:16

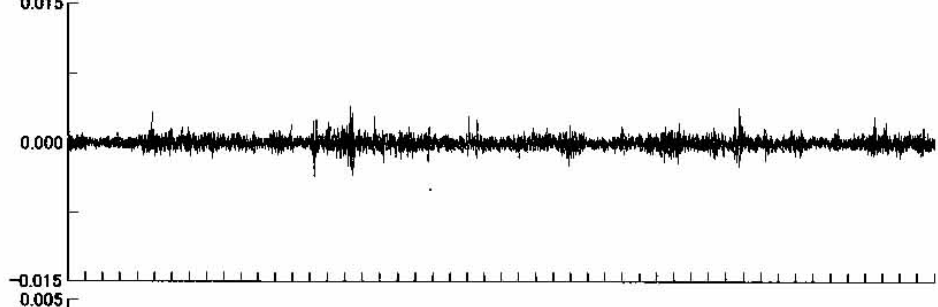
CH07:CH-7
Max. = 0.002 (kine)
Min. = -0.002 (kine)



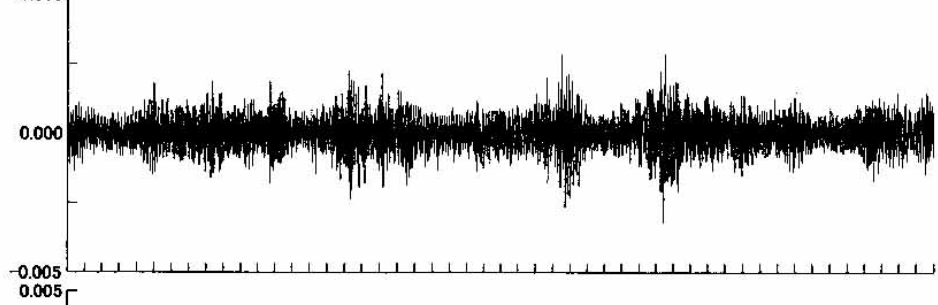
CH08:CH-8
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Min. = -0.005 (kine)



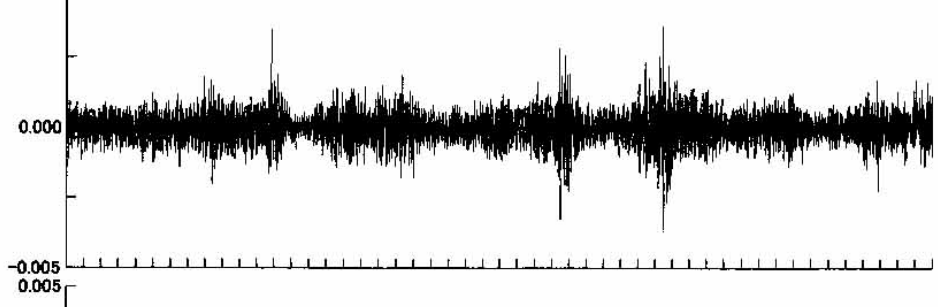
CH09:CH-9
Max. = 0.004 (kine)
Min. = -0.004 (kine)



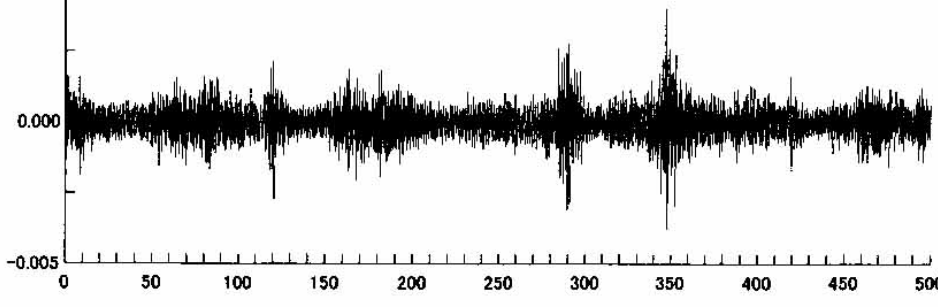
CH10:CH-10
Max. = 0.003 (kine)
Min. = -0.003 (kine)



CH11:CH-11
Max. = 0.004 (kine)
Min. = -0.004 (kine)



CH12:CH-12
Max. = 0.004 (kine)
Min. = -0.004 (kine)



0 50 100 150 200 250 300 350 400 450 500 (Sec)

Acknowledgement

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