

About the seismic performance score of the wooden houses

The seismic performance scores by the precise seismic diagnosis listed in Tables 2~4 of the experiment outline (20051121.pdf) are modified after the experiment. The modified seismic performance scores are as follows;

Table2 The result of seismic diagnosis of Model A

	Floor	Required strength Qr(kN)	Retained strength (before modification) (kN)	Stiffness ratio reduction Fs	Eccentricity reduction Feq	Floor spec. reduction Fef	Retained strength Qd(kN)	Sufficiency ratio Qd/Qr
X	2	20.96	25.83	1.00	1.00	1.00	25.83	1.23
	1	43.44	51.00	1.00	1.00	1.00	51.00	1.17
Y	2	20.96	19.57	1.00	0.91	1.00	17.80	0.85
	1	43.44	21.89	1.00	1.00	1.00	21.89	0.50

Table 3 The result of seismic diagnosis of Model B
(Before the seismic reinforcement)

	Floor	Required strength Qr(kN)	Retained strength (before modification) (kN)	Stiffness ratio reduction Fs	Eccentricity reduction Feq	Floor spec. reduction Fef	Retained strength Qd(kN)	Sufficiency ratio Qd/Qr
X	2	20.96	26.32	1.00	1.00	1.00	26.32	1.26
	1	43.44	55.13	1.00	1.00	1.00	55.13	1.27
Y	2	20.96	19.35	1.00	0.91	1.00	17.60	0.84
	1	43.44	20.84	1.00	1.00	1.00	20.84	0.48

Table 4 The result of seismic diagnosis of Model B
(After the seismic reinforcement)

	Floor	Required strength Qr(kN)	Retained strength (before modification) (kN)	Stiffness ratio reduction Fs	Eccentricity reduction Feq	Floor spec. reduction Fef	Retained strength Qd(kN)	Sufficiency ratio Qd/Qr
X	2	20.96	40.72	1.00	1.00	1.00	40.72	1.94
	1	43.44	85.45	1.00	1.00	1.00	85.45	1.97
Y	2	20.96	42.14	1.00	1.00	1.00	42.14	2.01
	1	43.44	79.83	1.00	1.00	1.00	79.83	1.84

As the detailed report, refer to the following references.

- Shimizu, H. et al, 2008, "Shaking Table Test on full Scale Wooden Houses, Special project for Earthquake Disaster Mitigation in Urban Areas in 2005 – Improvement of Seismic Performance of Structures by E-Defense", Technical Note of the National Research Institute for Earth Science and Disaster Prevention, No.320.
(PDF is available from the following URL;
http://dil-opac.bosai.go.jp/publication/nied_tech_note/pdf/n320.pdf)