Table 2. Exercise Test Results

| Variable | Before Exercise training | After Exercise training | <u>t</u> -value | |
|------------------------------------|--------------------------|-------------------------|-----------------|--|
| | Mean (SD) | Mean (SD) | | |
| HR rest (bpm) | 99.5 (13.3) | 94.7 (11.7) | 1.49 | |
| HR peak (bpm) | 133.2 (14.1) | 128.7 (16.0) | 1.04 | |
| SBP rest (mmHg) | 128.6 (17.3) | 119.5 (9.9) | 2.78* | |
| SBP peak (mmHg) | 163.1 (20.9) | 156.5 (19.3) | 1.35 | |
| Estimated VO _{2max} (MET) | 5.4 (2.0) | 8.1 (2.0) | -8.43*** | |
| Walking time (min) | 11.9 (6.1) | 20.1 (5.7) | -8.38*** | |

MET = metabolic equivalent; 1 MET = 3.5 ml O₂ kg⁻¹min⁻¹.

*p < 0.05, ***p < 0.0001.

Table 3. Results of Lung Function Tests

| Variable | Before exercise training Mean (SD) | After exercise training Mean (SD) | <u>t</u> -value |
|-----------------|------------------------------------|--------------------------------------|-----------------|
| FEV1 | 2.39 (0.97) | 2.23 (1.07) | 0.749 |
| FEV1% predicted | 89.85 (34.1) | 84.23 (32.4) | 0.658 |
| FVC | 2.70 (1.3) | 2.63 (0.98) | 0.255 |
| FVC% predicted | 82.92 (35.3) | 81.08 (21.9) | 0.219 |
| FEV1/FVC% | 145.6 (90.2) | 160.0 (84.7) | 0.607 |

Table 4. Activity Status of Patients with Orthotopic Heart Transplantation before and after Exercise Training

| Item of activity | Before exercise training n (%) | After exercise training n (%) | Weight |
|---|--------------------------------|-------------------------------|---------------|
| 1.Taking care of oneself, that is, eating, dressing, bathing, or using the toilet | 13 (100%) | 13 (100%) | 2.75 |
| 2. Walking indoors, such as around the house | 13 (100%) | 13 (100%) | 1.75 |
| 3. Walking a block or 2 on level ground | 13 (100%) | 13 (100%) | 2.75 |
| 4. Climbing a flight of stairs or walking up a hill | 13 (100%) | 13 (100%) | 5.50 |
| 5. Running a short distance | 4 (31%) | 10 (77%) | 8.00 |
| 6. Doing light work around the house | 13 (100%) | 12 (92%) | 2.70 |
| 7. Doing moderate work around the house | 11 (85%) | 12 (92%) | 3.50 |
| 8. Doing heavy work around the house | 4 (31%) | 9 (69%) | 8.00 |
| 9. Doing yard work | 11 (85%) | 10 (77%) | 4.50 |
| 0. Engaging in sexual activities | 8 (62%) | 10 (77%) | 5.25 |
| 1. Participating in moderate recreational activities | 2 (15%) | 6 (46%) | 6.00 |
| 2. Participating in strenuous sports | 2 (15%) | 3 (23%) | 7.50 |
| Total value: Mean (SD) | 33.9 (12.6) | 42.2 (15.6) | HANCE SERVICE |

not significantly change after exercise training (Table 3). However, more subjects reported being capable of performing moderate activities after exercise training (Table 4). The mean scores on the Duke Activity Status Index significantly increased after training ($\underline{t} = -2.54$, $\underline{p} = 0.026$).

Exercise Self-efficacy, Body Image, and Physical Symptoms

In order to evaluate the psychological effects of exercise training, the subject's body image, exercise

self-efficacy, and physical symptoms were measured before and after training. Table 5 reveals that body image significantly improved ($\underline{t} = -2.54$, $\underline{p} = 0.026$) after training, but a significant change in physical symptoms was not observed. Exercise self-efficacy significantly increased after training ($\underline{t} = -5.22$, $\underline{p} < 0.0001$).

Influence of Gender and Intervals after Heart Transplantation on Psychological and Physiological Adaptations after Exercise Training

Table 6 shows that body image, self-efficacy, esti-