Appendix

Participants and Exclusion Criteria

Enrollment began in June 2019 and ended in March 2020, due to COVID. Patients were approached during CR or by phone if it was not possible to discuss participation in person. Subjects were excluded for any disease that would make monitoring an exercise HR technically difficult or unreliable, such as permanent atrial fibrillation, heart transplant, or left ventricular assist devices. We excluded patients in which exercise intensity might be limited by medical conditions such as stable angina, high risk unrevascularized coronary artery disease, symptomatic peripheral vascular disease, or orthopedic limitations. To assure consistent mode of exercise, we excluded patients who were unable or unwilling to complete a maximal exercise test or could not exercise on a treadmill.

Methods

Risk stratification

We used the AACVPR risk-score to determine the number of CR sessions patients with monitored using continuous electrocardiography. Low risk patients discontinued telemetry after 6 sessions, intermediate risk patients after 12 sessions with telemetry every 6 sessions after that. High risk patients continued with telemetry for all 36 CR sessions.[11] When on telemetry, exercise HR was recorded using this system.

Renumeration

Patients were given a token incentive for participation. Patients received $20 after completing all baseline assessments, $20 after completing 12 CR sessions, and $50 for completing the final exercise test and exit surveys.

Statistical analysis

All data were summarized using proportions, means and standard deviations, medians and interquartile ranges, and linear trends over time. Mixed factorial and one-way ANOVAs were run when appropriate to examine mean differences across groups. Partial eta^2 was calculated to determine effect size. The following were considered the cut off for large, medium, and small effect sizes of .14, .06, .01, respectively[20]. The statistical software SPSS version 24 (IBM) was used to complete all statistical analyses.

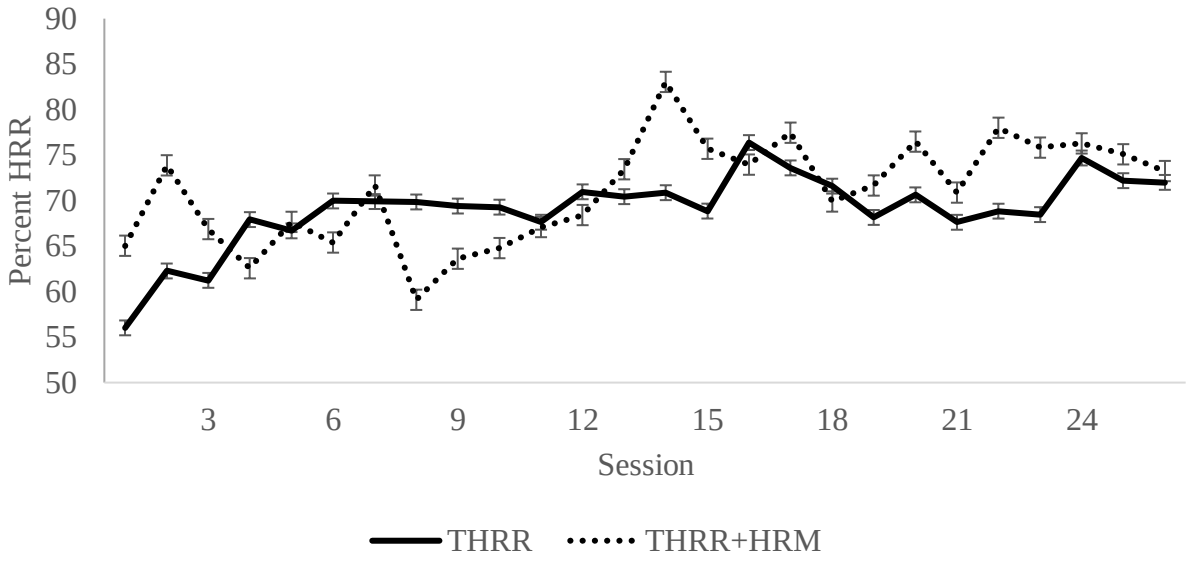
End Survey

Questions were reviewed for clarity and content validity. Exit surveys were given to subjects within the last week of CR and collected on the last CR session. As a part of the satisfaction survey, we asked subjects in the THRR+HRM group specific questions about using the device during CR. Patients who had completed at least 6 sessions after randomization were asked to complete satisfaction surveys. A total of 37 patients completed the exit survey. Patients reported understanding their exercise prescription and generally enjoyed their assigned exercise prescription (eTable 1).

eTable 1. Summary of responses to patient satisfaction survey

Please Indicate Your Level of Agreement with the Following Statements 1: strongly disagree, 2: disagree, 3: neither agree nor disagree, 4: agree, 5: strongly agree						
	RPE (N = 12)		THR (N =13)		HRM (N = 12)	
	Mean ±SD	Strongly Agree	Mean ±SD	Strongly Agree	Mean ±SD	Strongly Agree
I plan to continue to exercise regularly after cardiac rehab	4.8 ± .6	83%	4.9 ± .4	85%	4.5 ± .9	67%
I enjoyed exercising in the group I was assigned to	4.8 ± .3	83%	4.7 ± .5	70%	5.0 ± .0	100%
I understood how my exercise was being prescribed	4.9 ± .3	92%	4.6 ± .5	62%	4.8 ± .5	75%
My exercise program was appropriate for my ability	4.8 ± .4	75%	4.7 ± .5	70%	4.6 ± 1.2	91%

RPE: rate of perceived exertion, THR: target heart rate, HRM: heart rate monitor, SD: standard deviation



eFigure 1. Percent of HRR calculated from peak exercise heart rate for each CR session. Subjects successfully exercised within 60-80% of HRR throughout CR. HRR, Heart rate reserve, THRR: target heart rate range, HRM: Heart rate monitor