Methods

Cytosolic Ca\textsuperscript{2+} measurements
Cytosolic Ca\textsuperscript{2+} levels (Ca\textsuperscript{2+}\textsubscript{i}) were measured during diastole and systole using fluorescent dye Fluo-4. For Ca\textsuperscript{2+}\textsubscript{i} measurements, cardiac myocytes were loaded with 20 µM of the Ca\textsuperscript{2+} sensitive dye fluo-4 (\(\lambda_{\text{ex}} = 488\) nm and \(\lambda_{\text{em}} = 565–605\) nm) for 20 min at room temperature. To block the mRyR1, cells were pre-incubated in 1 µM Dantrolene for 10 min, and 1 µM Dantrolene was present during the experiment. Changes in Ca\textsuperscript{2+} concentration are presented as relative changes in fluorescence because the calibration of non-ratiometric dyes used in our study in terms of Ca\textsuperscript{2+} concentration is not possible. For easier understanding of the manuscript, the relative changes in fluorescence measured by us will be termed "Ca\textsuperscript{2+} concentration" throughout the manuscript.

Figure S1. Mean values of cardiomyocytes treated with 2 µM AngII in the absence (red) or presence of 1 µM mRyR1 blocker Dantrolene (green). To block the mRyR1 cells were pre-incubated in 1 µM Dantrolene for 10 min, and 1 µM Dantrolene was present during the experiment. Cells were electrically-field stimulated at 1 Hz and changes in diastolic and systolic cytosolic Ca\textsuperscript{2+} levels were measured over 20 min.