## **Description of Additional Supplementary Files**

**Supplementary Video S1**: Cardiac MRI videos after decreasing or increasing age by moving in cross-modal latent space.

**Supplementary Video S2**: Cardiac MRI videos after decreasing or increasing BMI by moving in cross-modal latent space.

**Supplementary Video S3**: Cardiac MRI videos after decreasing or increasing LVM by moving in cross-modal latent space.

**Supplementary Video S4**: Cardiac MRI videos after decreasing or increasing RVEDV by moving in cross-modal latent space.

**Supplementary Video S5**: Cardiac MRI videos after moving in directions corresponding to female or male labeled points in cross-modal latent space.