EchoFM: A View-Independent Echocardiogram Model for the Detection of Pulmonary Hypertension

Shreyas Fadnavis^{*1}, Chaitanya Parmar^{*1}, Nastaran Emaminejad¹, Alvaro Ulloa Cerna¹, Areez Malik¹, Mona Selej¹, Tommaso Mansi¹, Preston Dunnmon¹, Tarik Yardibi¹, Kristopher Standish^{†1}, and Pablo Damasceno^{†1}

¹Janssen R&D, LLC, a Johnson & Johnson Company, NJ, USA {sfadnavi, cparmar, nemamine, aulloace, amalik6, mselej, tmansi, pdunnmon, tyardibi, kstandis, pdamasc1}@its.jnj.com

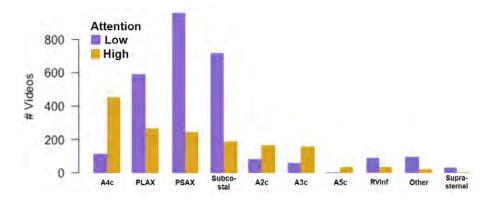


Fig. 1. Number of videos with high (orange) and low (purple) attention scores from EchoFM as a function of the video view. While A4c, the predominantly used view for automated PH diagnosis, shows the largest number of videos with high attention scores, it is closely followed by PLAX, PSAX, and Subcostal views, indicating that these views are also relevant for automated PH classification. This observation aligns with guidelines used by clinicians to diagnose, which suggest using these four views to establish signs of PH disease from TTE, and indicates that EchoFM is benefiting from information from multiple views.