

Figure 1 - Critic architecture

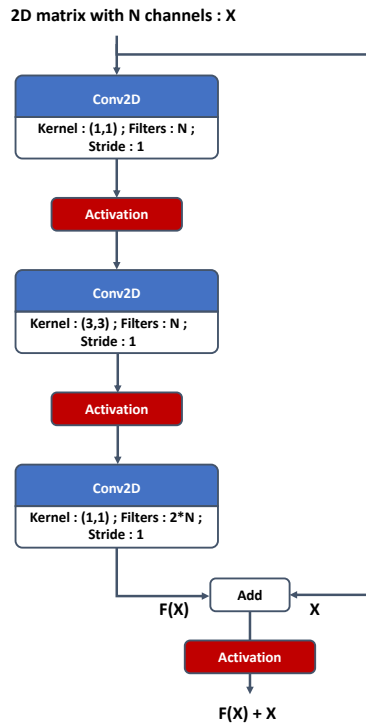


Figure 2 Residual identity block for the critic

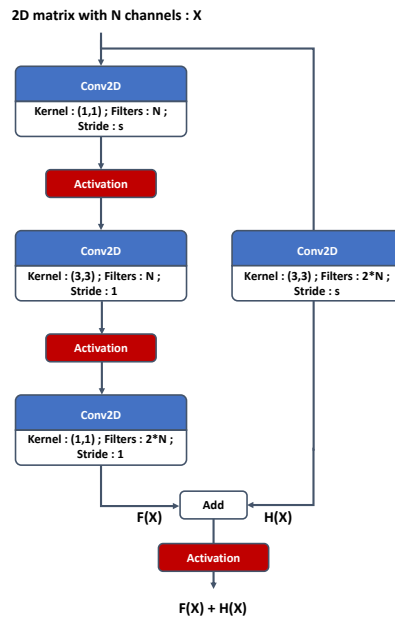


Figure 3 Residual convolutional block for the critic. If s is different from 1 it is referenced as strided convolutional block in Fig. 1

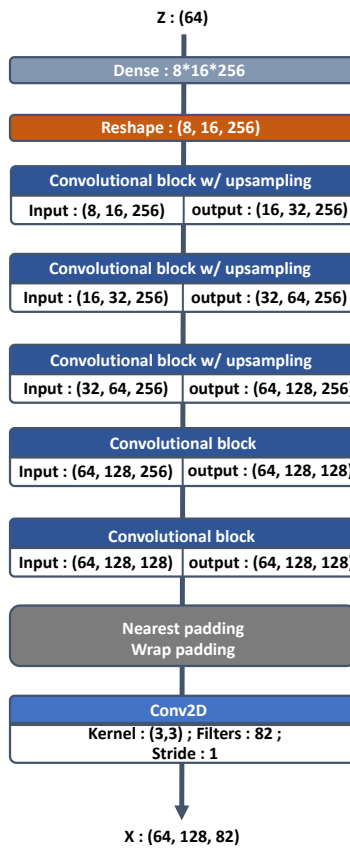


Figure 4 Generator Architecture

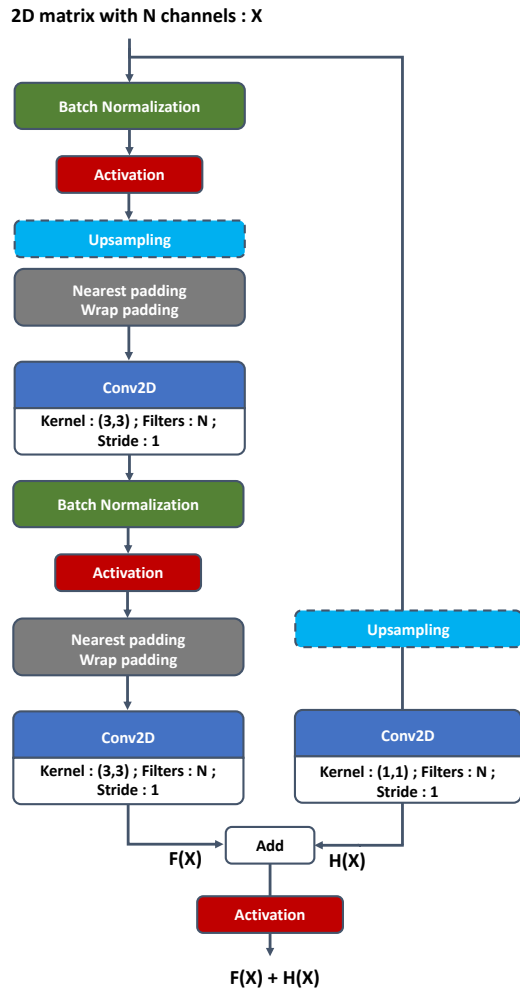


Figure 5 Residual convolutional block for the generator. The upsampling layer can be removed if not necessary and is mentioned when used in Fig. 4

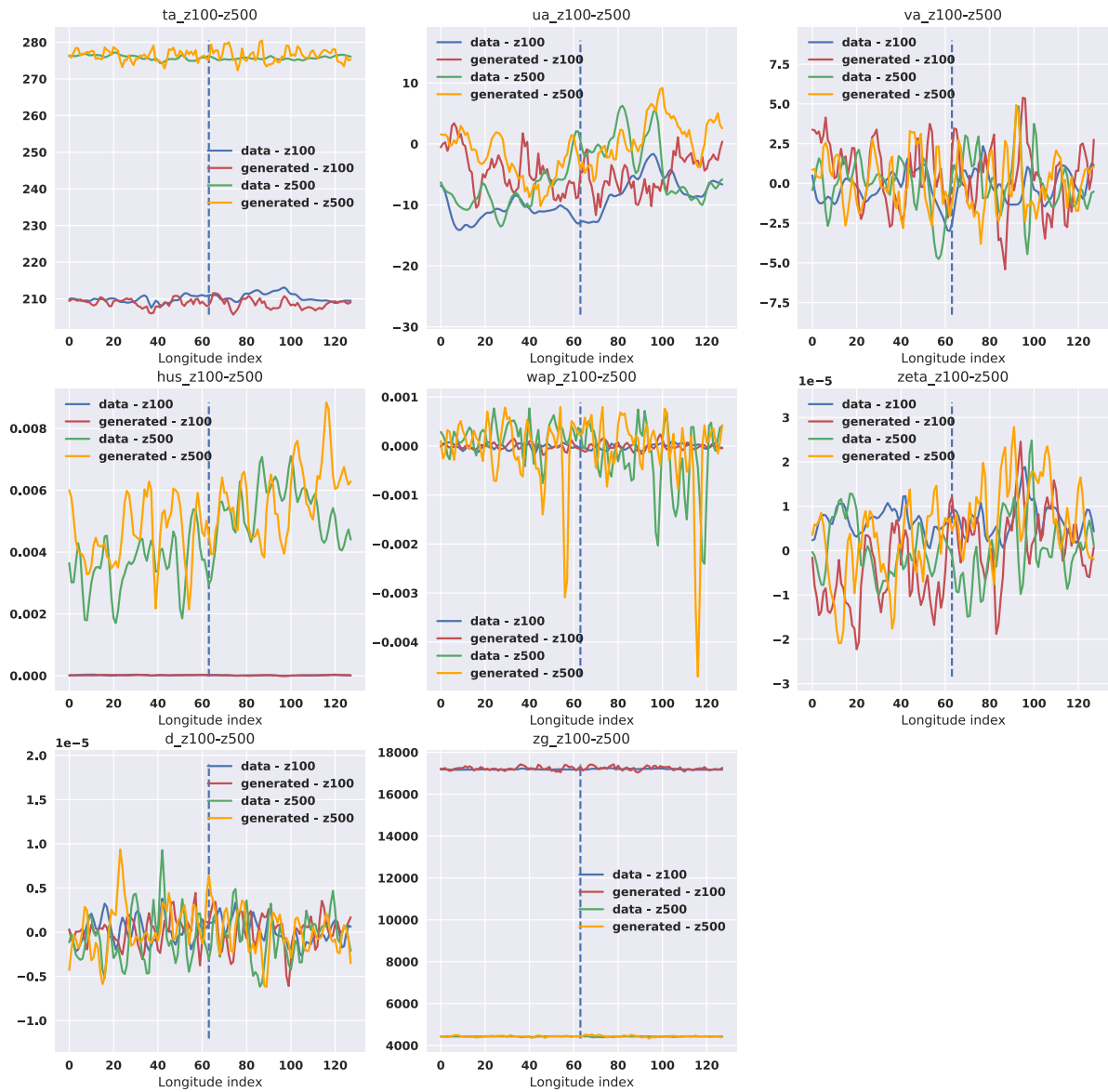


Figure 6 Variables of 1 sample from the dataset and 1 from the generator along the longitude for 2 levels z100 and z500. The dashed line represents the domain boundary where the periodic boundary condition should be enforced.