

# Inception 3D Unet

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Our 3D network takes the MR images as the input and outputs the segmentation result in an end-to-end manner. We choose the 3D CNN and 3D inception block stack as our backbone architecture but make the following main modifications: (a) we design multi-view convolutions to take the advantage of both 2D and 3D convolutional structures;(b) we design a new deeply supervised mechanism to effectively learn discriminative features for prostate segmentation and meanwhile boost the gradient flow of the whole network. In addition, we utilize multi-scale strategy to train our segmentation net.