

# FOF: Learning Fourier Occupancy Field for Monocular Real-time Human Reconstruction

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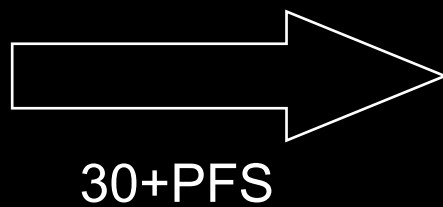
NeurIPS 2022

Qiao Feng   Yebin Liu   Yu-Kun Lai   Jingyu Yang   Kun Li

# Introduction



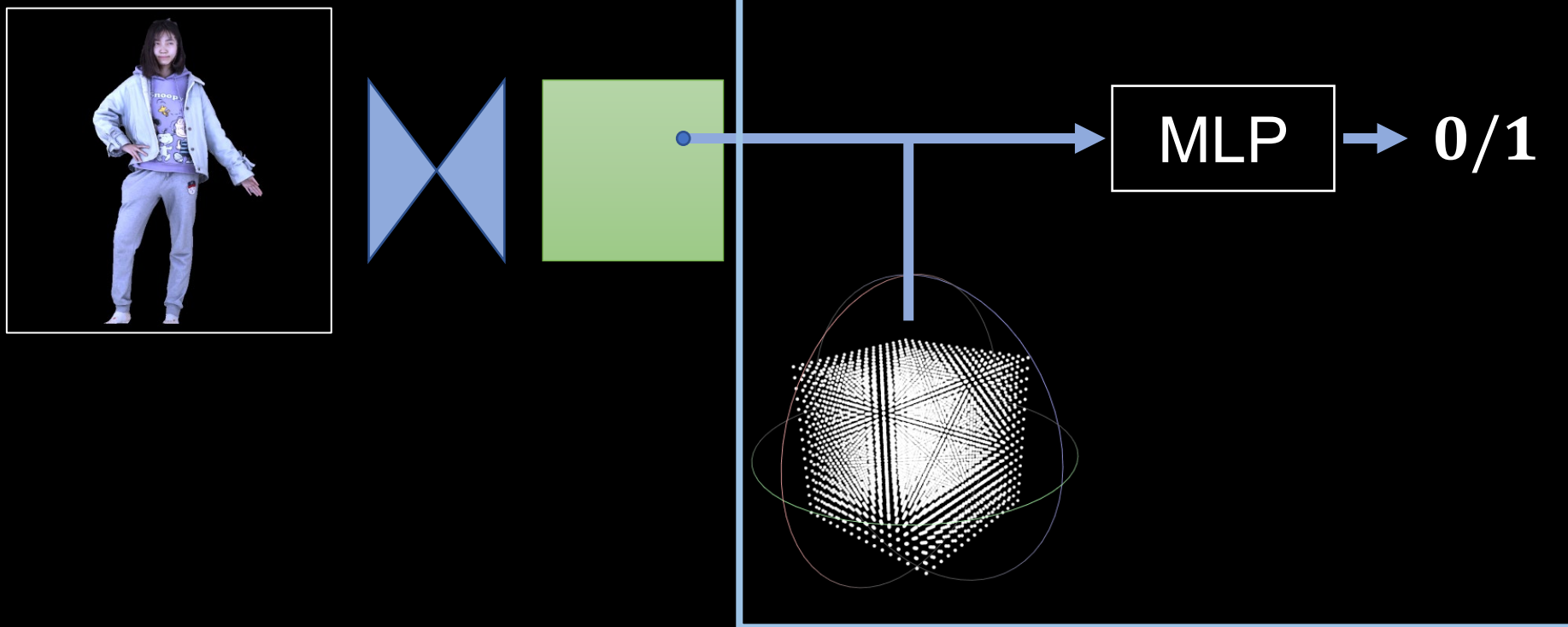
Input image



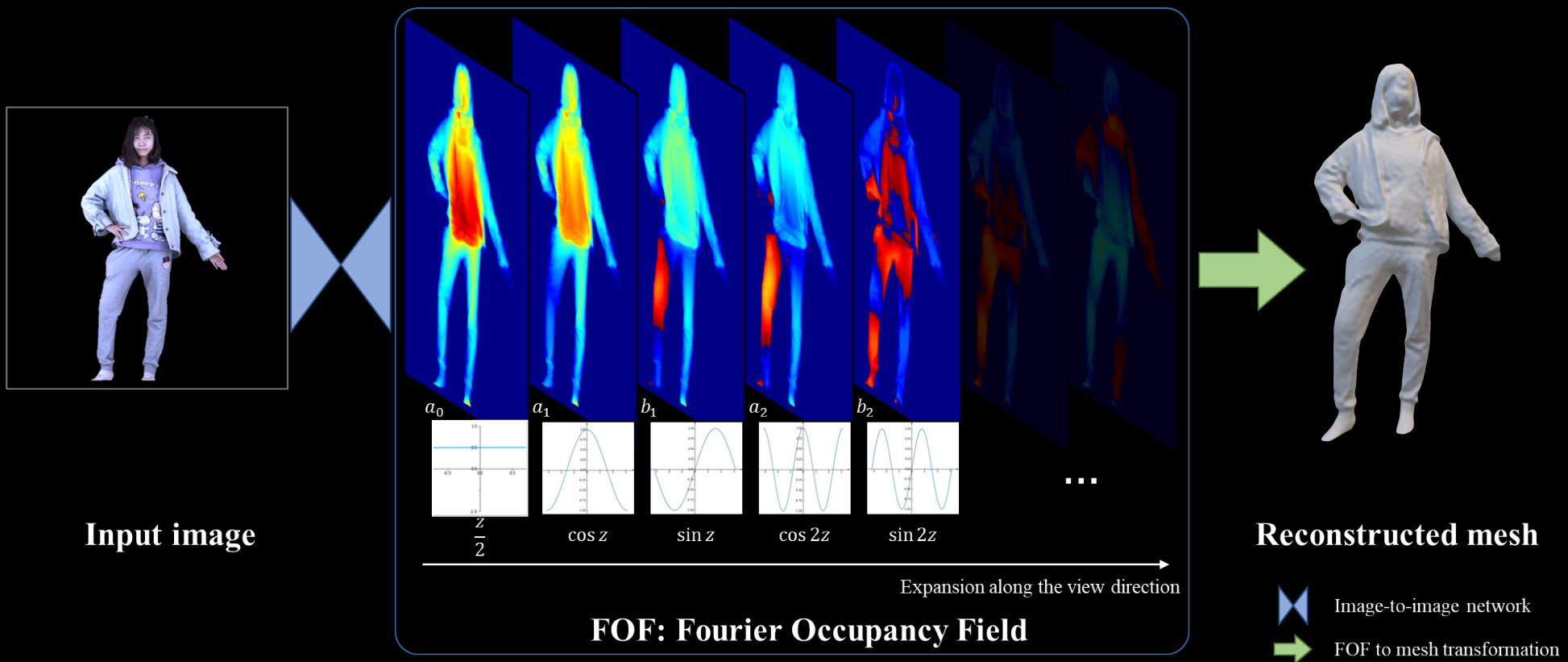
Reconstructed mesh

# Introduction

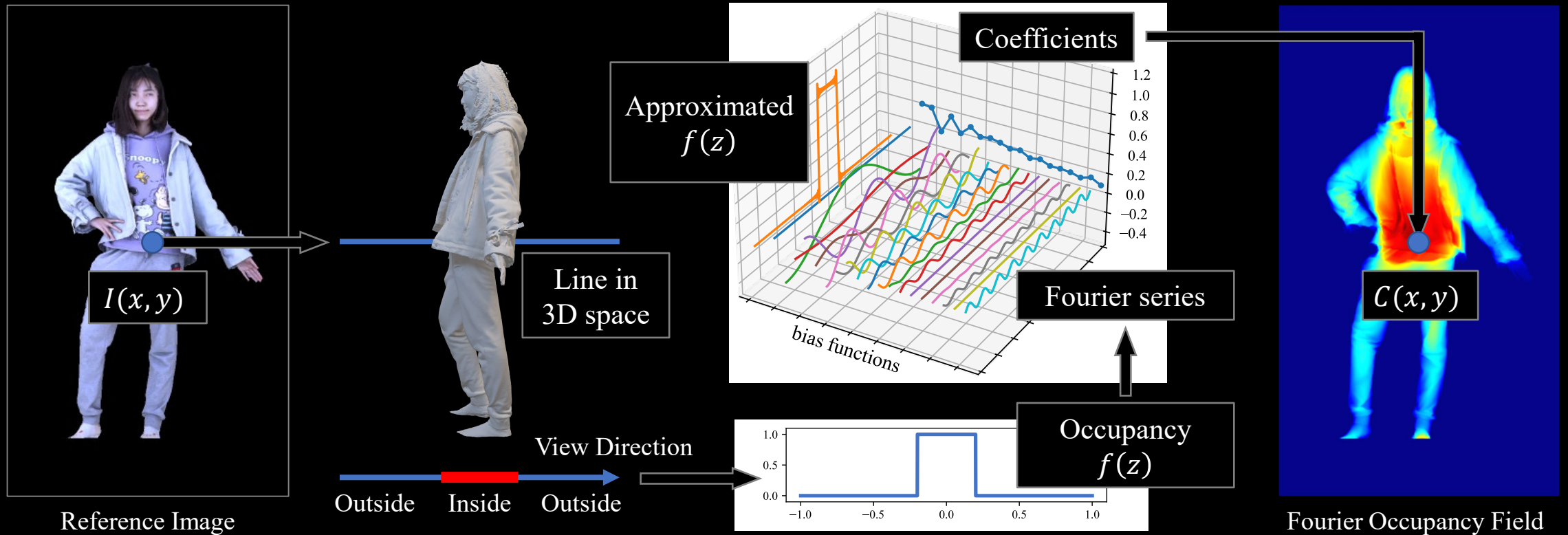
Existing Method



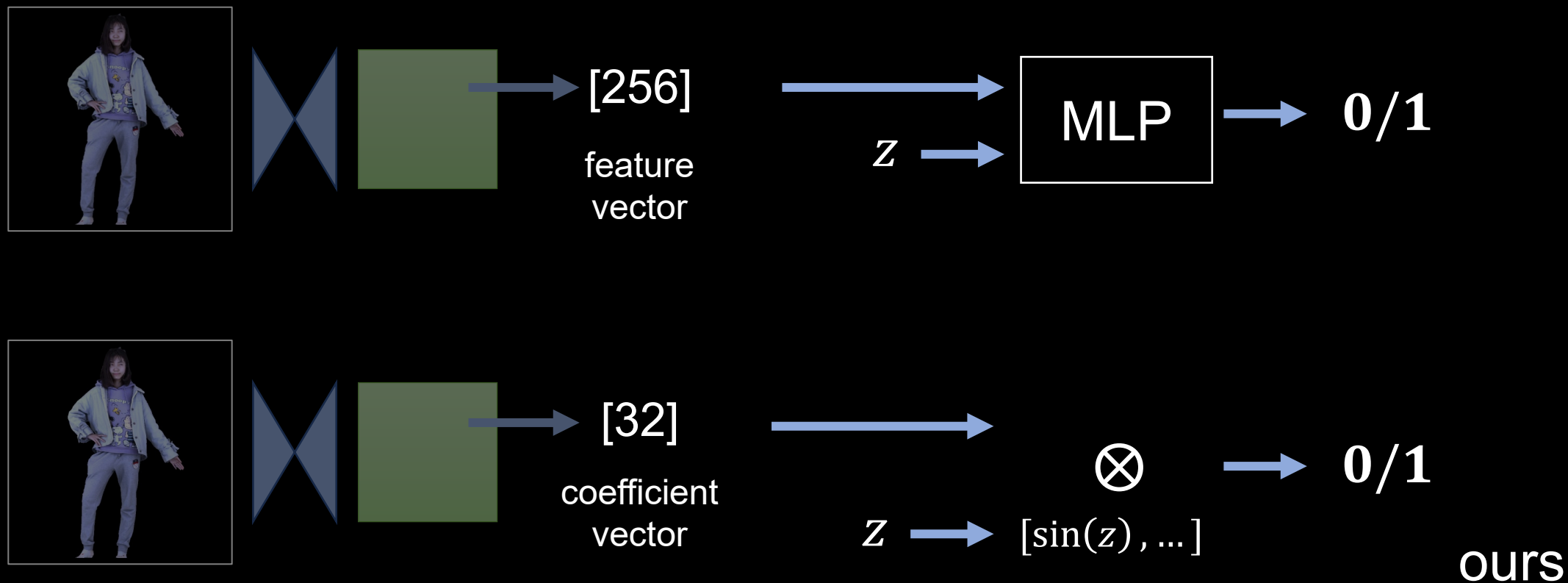
# Main Idea



# Proposed FOF



# Comparison



# 2N+1 Terms



$N = 3$



$N = 6$



$N = 9$



$N = 12$

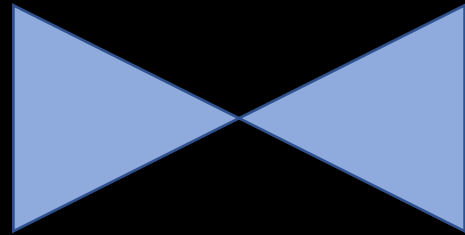


$N = 15$



Original Mesh

# Extensibility





# Results



Input image



FOF-Base (Ours)



FOF-SMPL (Ours)



FOF-Normal(Ours)



Ground truth



PIFu



ICON (filter+refine)

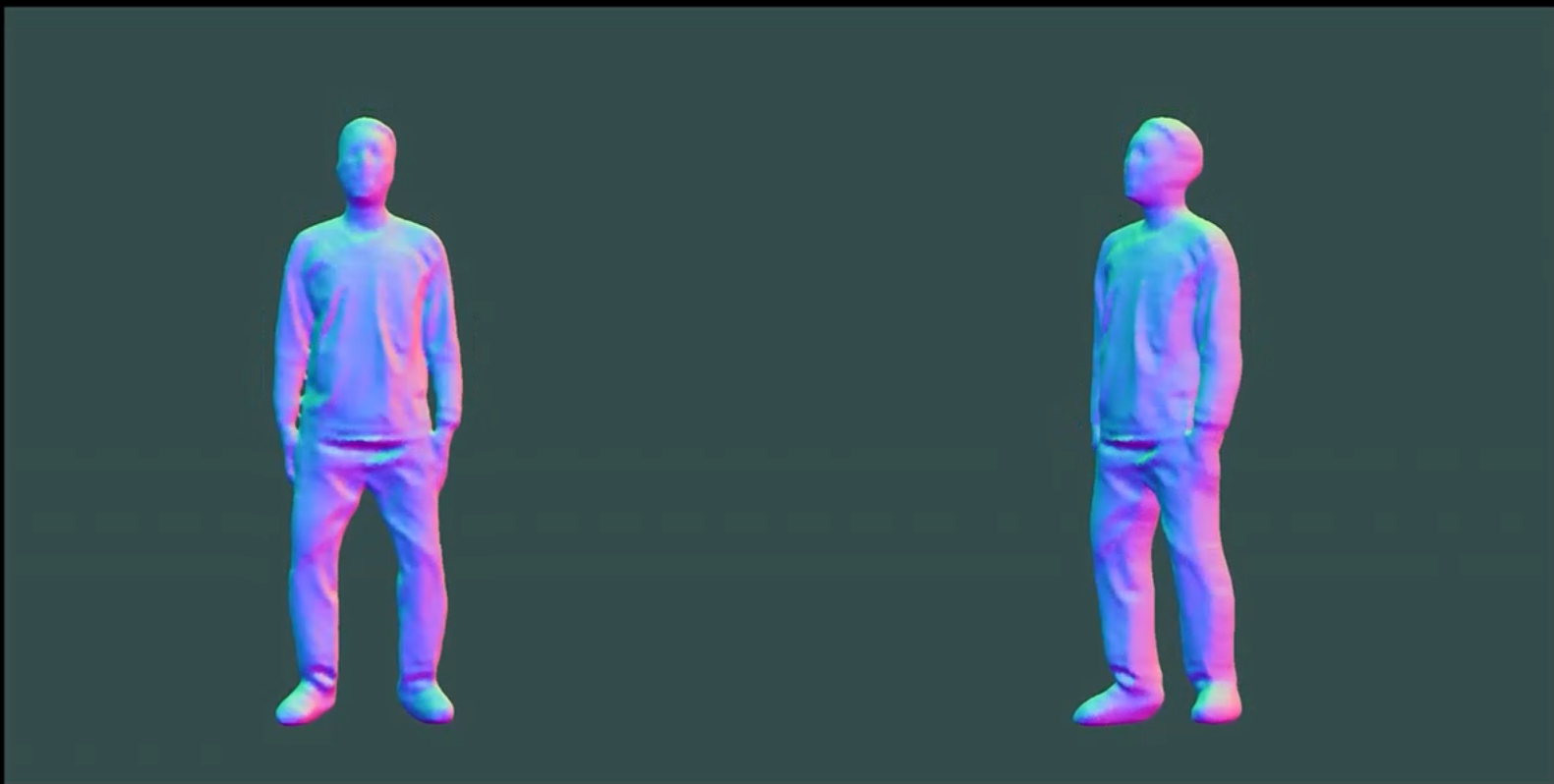


PIFuHD

# Realtime Demo



Input



View1

View2



Check our project  
page for more details!