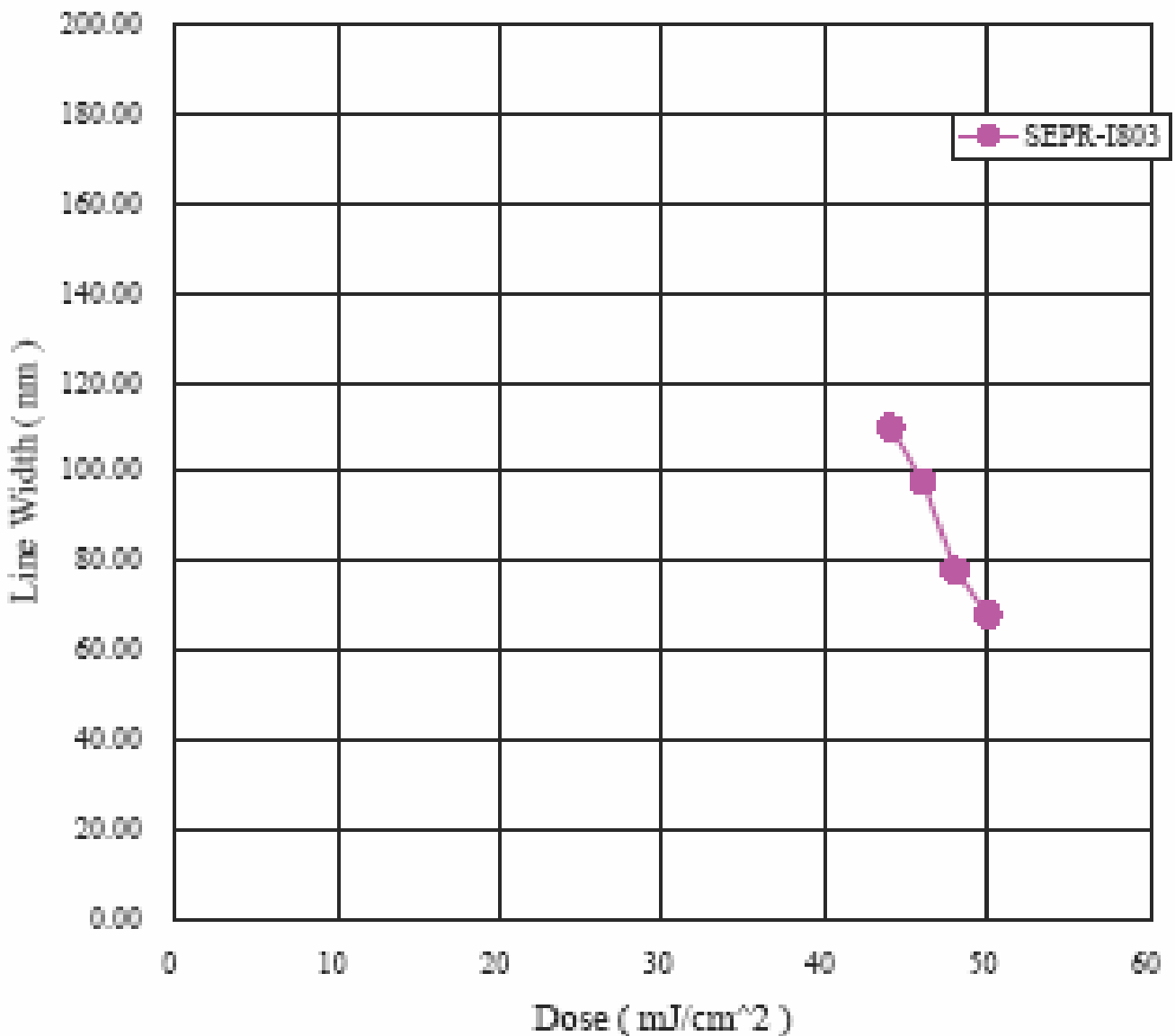


# SEPR – I803

DUV-44 on Si Substrate

Film Thickness: 250nm    Prebake: 110°C x 90 sec  
Exp.: (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )  
Mask: 100nm Line Focus: -1.0  $\mu\text{m}$  PEB: 110°C x 90 sec  
Dev.: 60 sec x 1 puddles (SSFD-238N [TMAH = 2.38%])



# SEPR-I803

## Exposure Latitude

### DUV-44 on Si Substrate



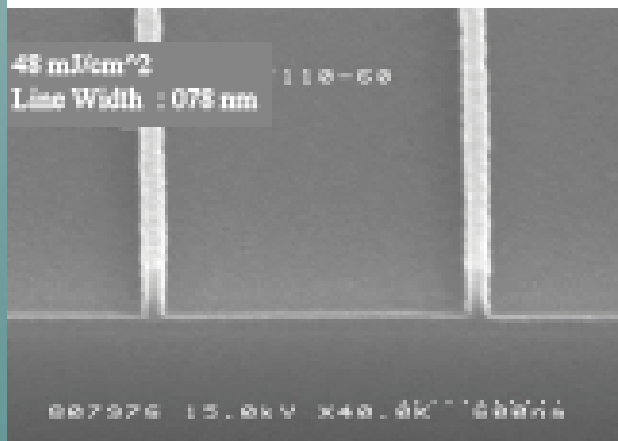
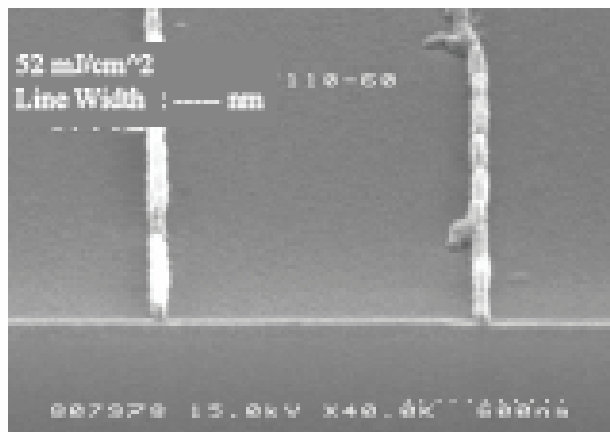
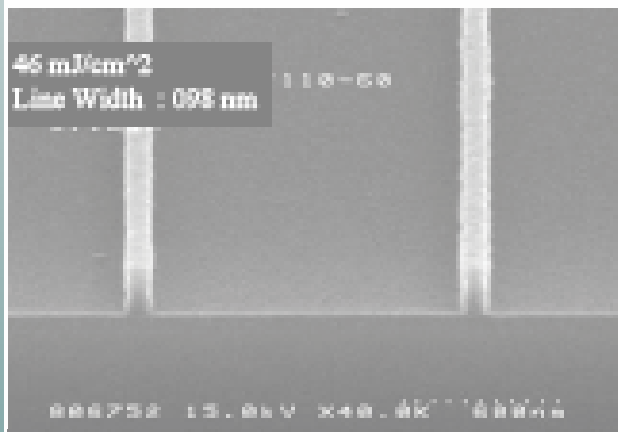
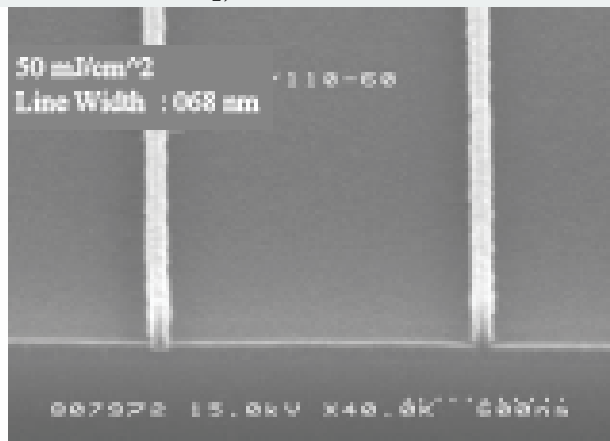
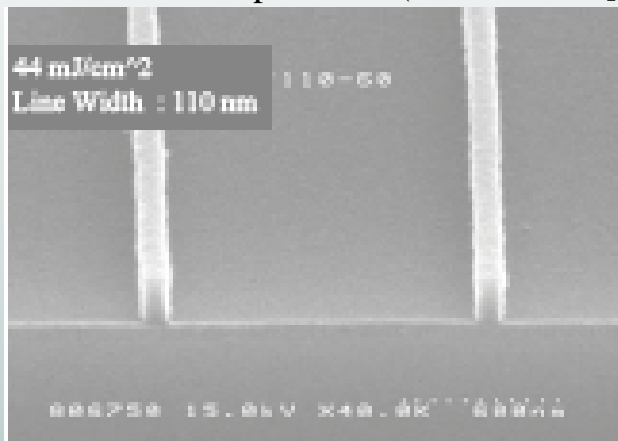
(FT:250 nm , Mask : 100nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 44, 46, 48, 50, 52mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

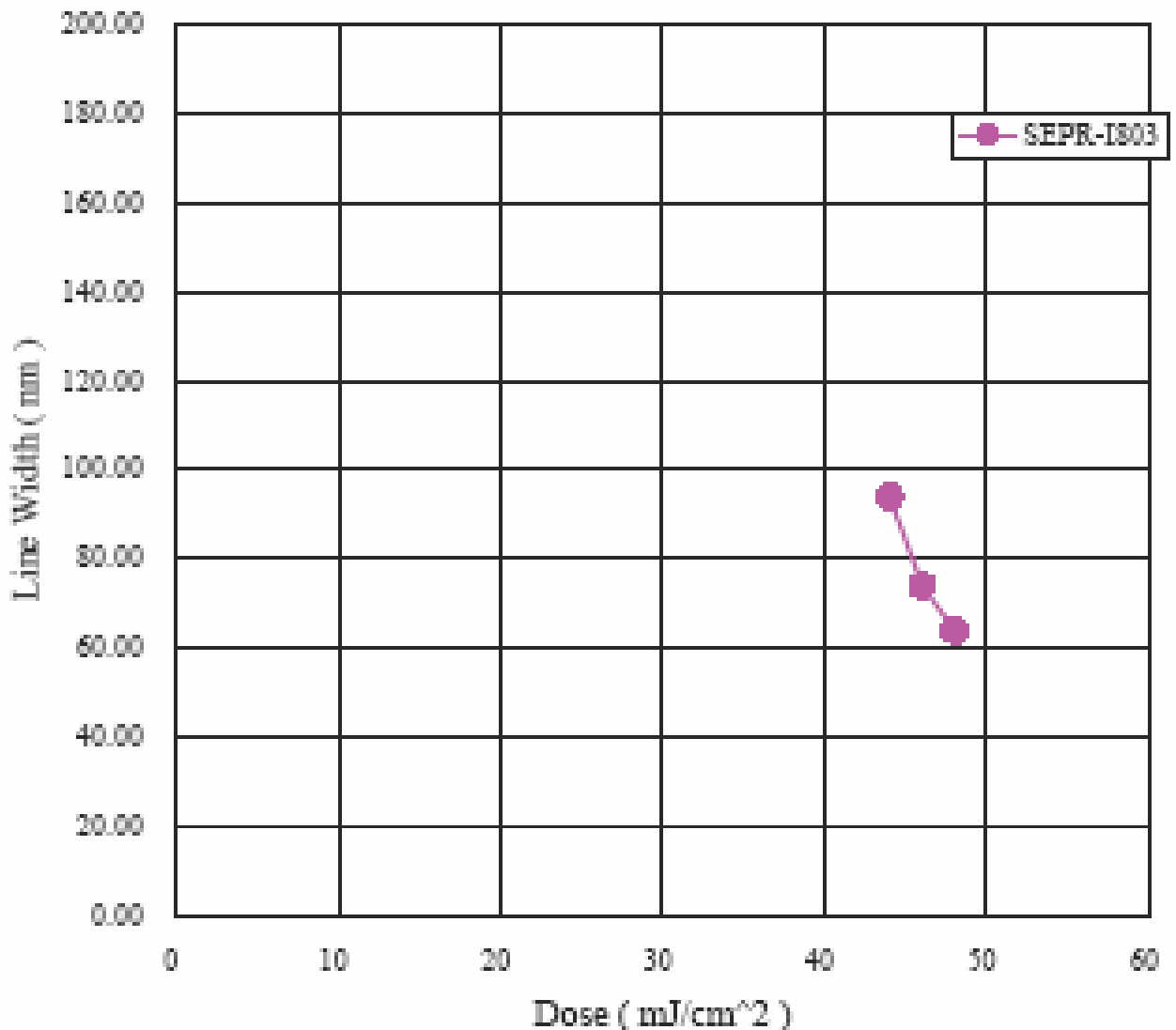
Mask: 100nm Line Focus: -1.0  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddles (SSFD-238N [TMAH = 2.38%])



DUV-44 on Si Substrate

Film Thickness: 250nm    Prebake: 110°C x 90 sec  
Exp.: (NSR-S203B NA = 0.68,  $\sigma = 0.75$ )  
Mask: 90nm Line    Focus: -1.0  $\mu\text{m}$     PEB: 110°C x 90 sec  
Dev.: 60 sec x 1 puddles    (SSFD-238N [TMAH = 2.38%])



# SEPR-I803

## Exposure Latitude

### DUV-44 on Si Substrate



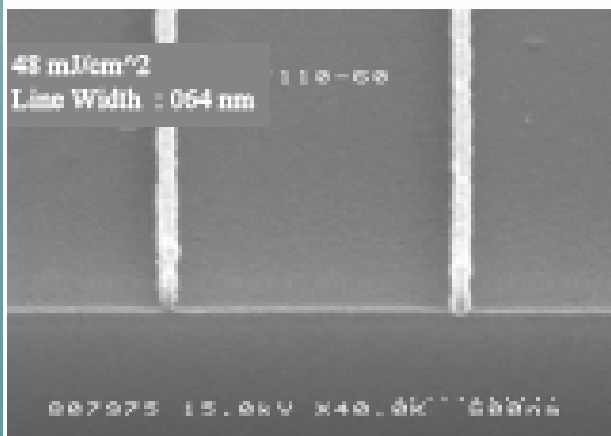
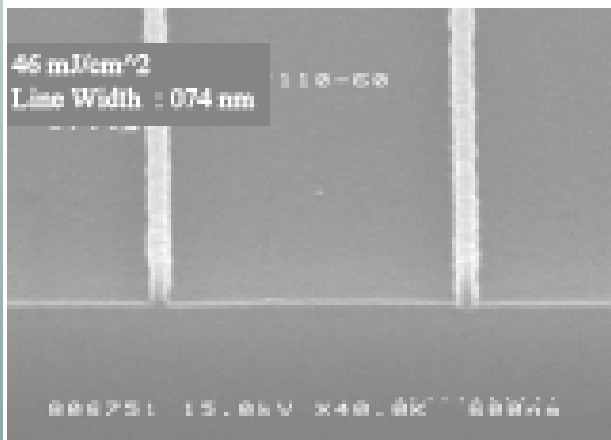
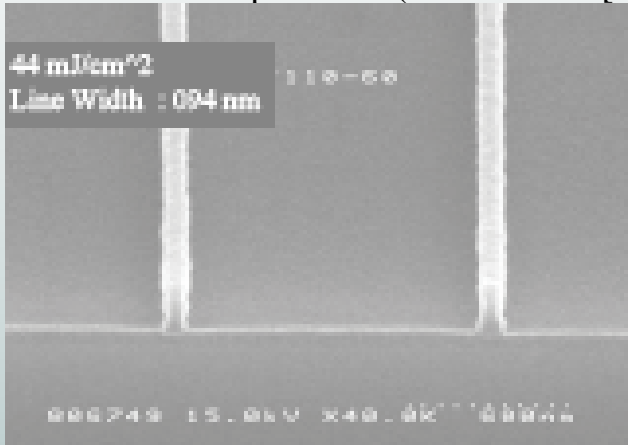
(FT:250 nm , Mask : 90nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 44, 46, 48, 50, mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask: 90nm Line Focus: -1.0  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddles (SSF-D-238N [TMAH = 2.38%])

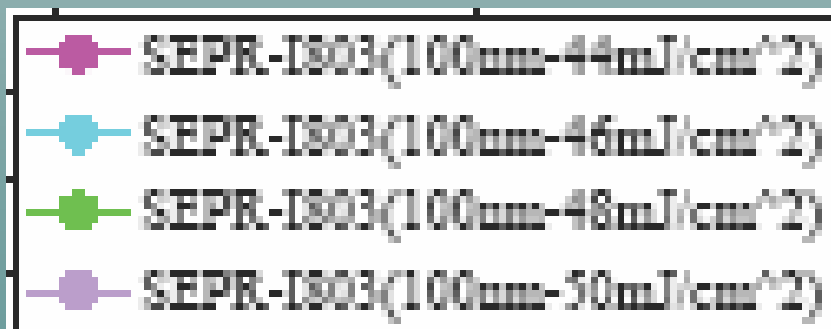
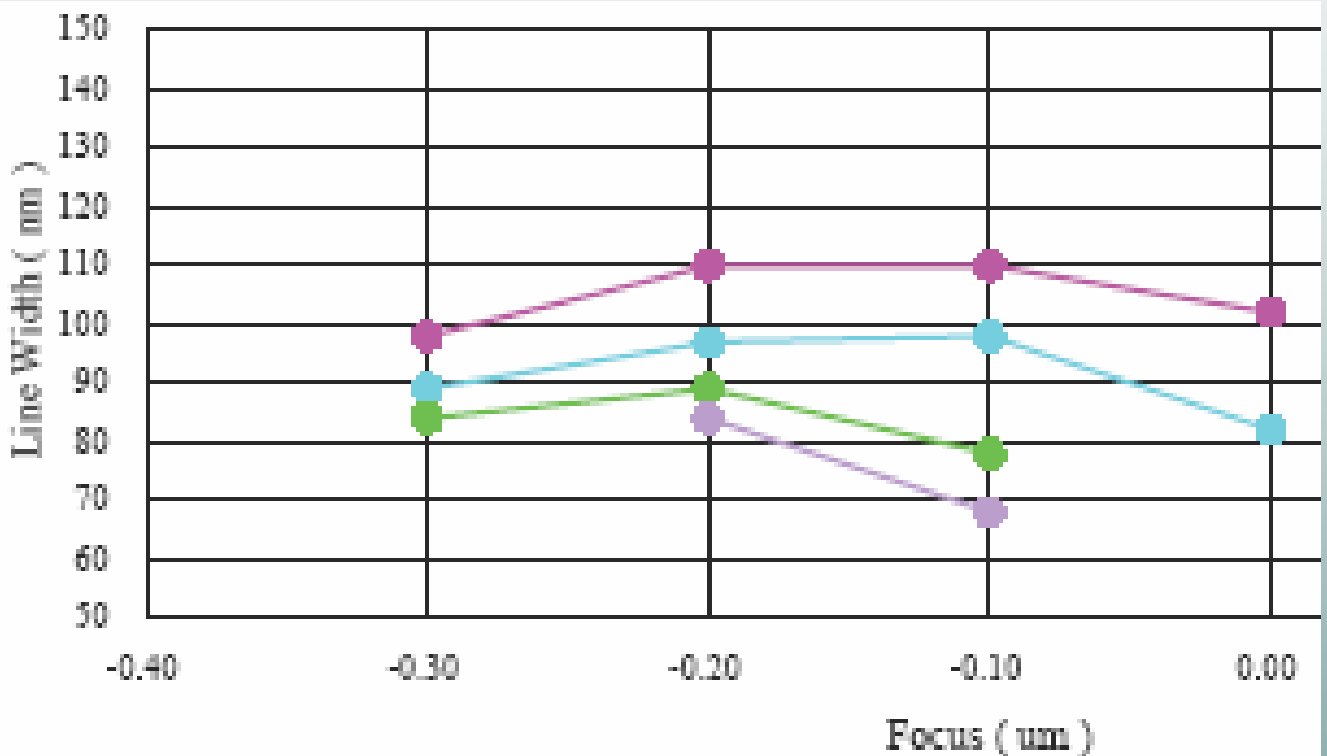


Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:100nm Line Focus: -0.4~+0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



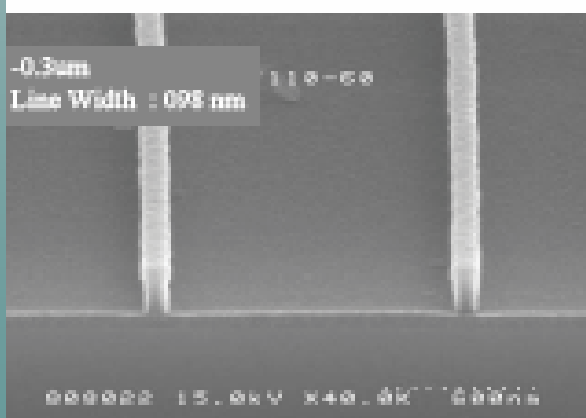
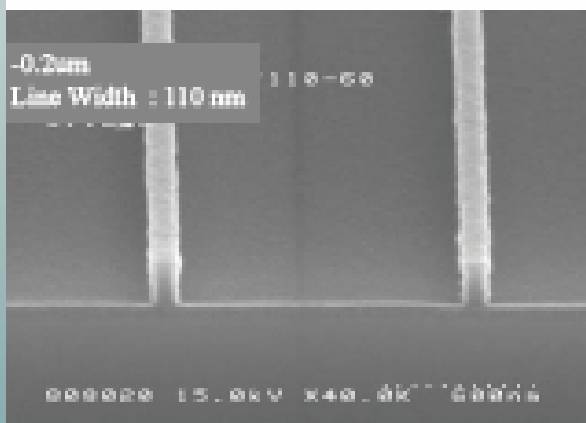
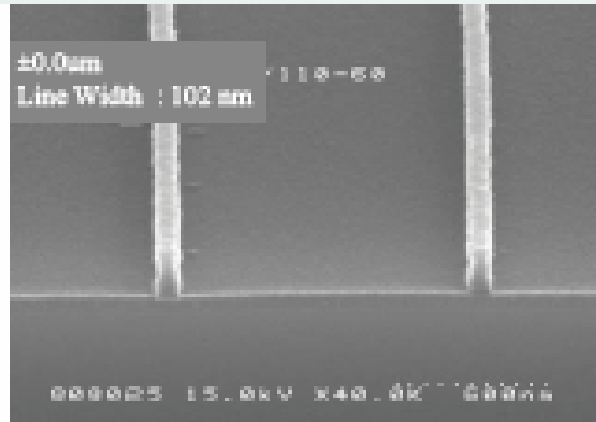
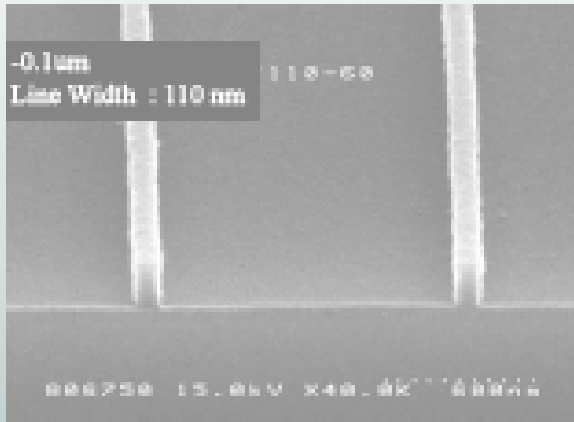
(FT:250 , Mask : 100nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 44mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:100nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



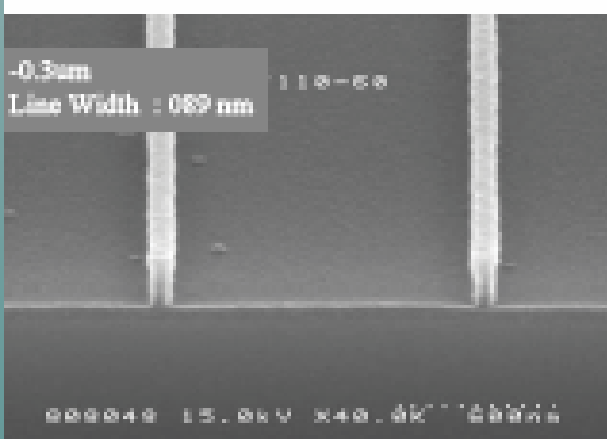
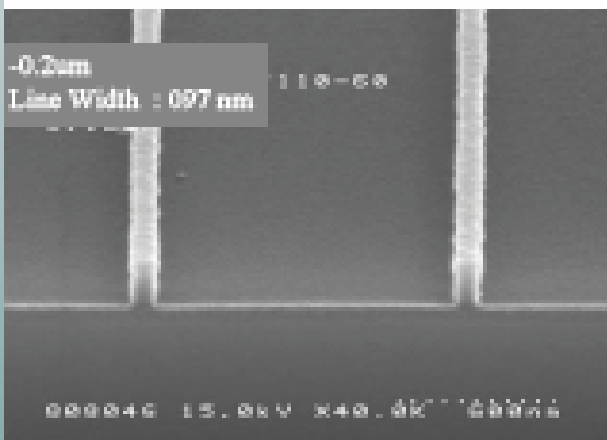
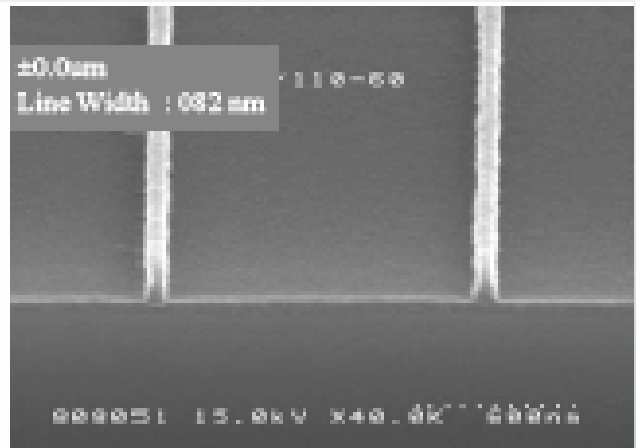
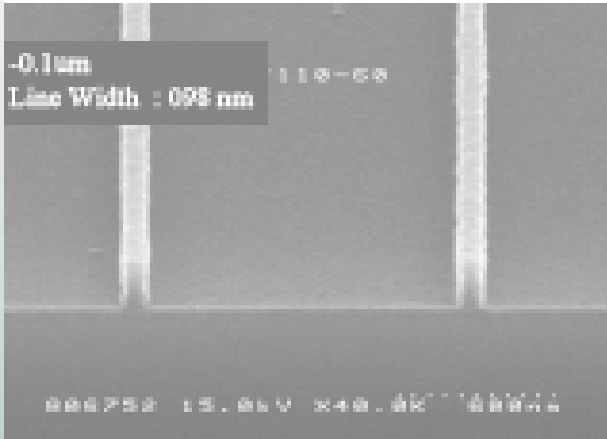
(FT:250 , Mask : 100nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 46mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:100nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



# SEPR- I803 DOF DUV-44 on Si Substrate

**ShinEtsuMicroSi**

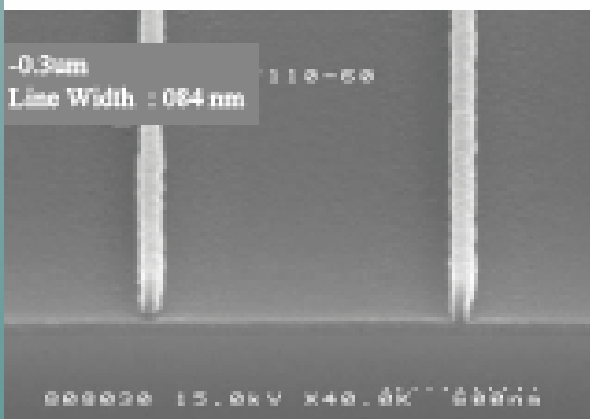
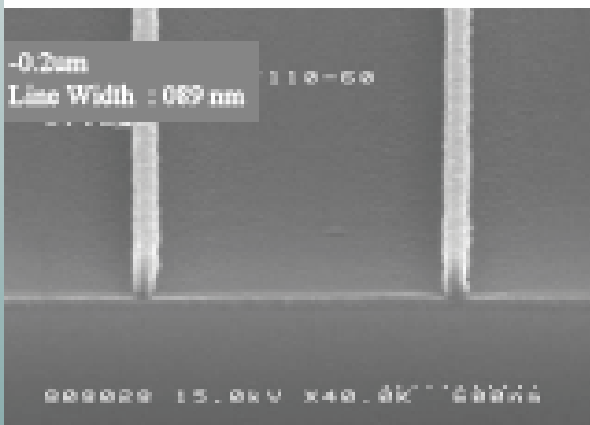
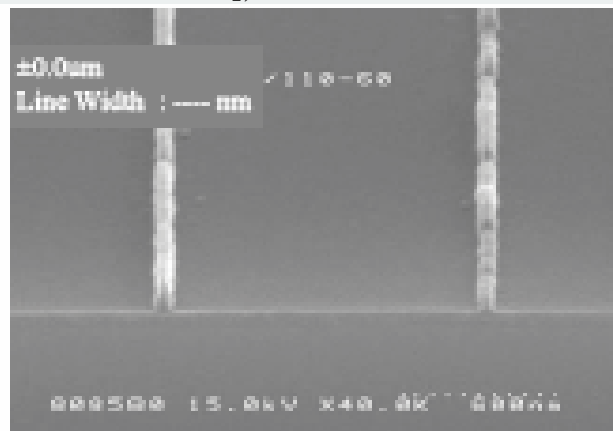
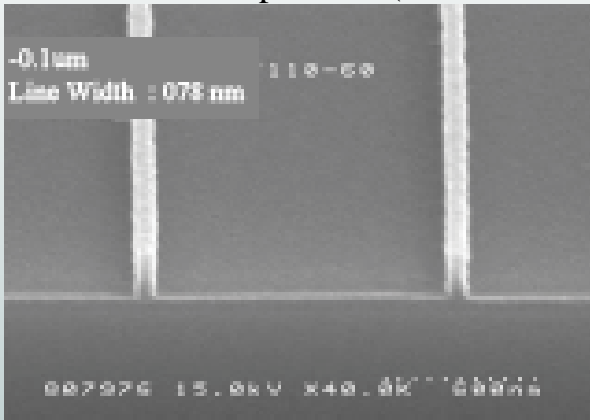
(FT:250 , Mask : 100nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 48mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:100nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



# SEPR- I803 DOF DUV-44 on Si Substrate

**ShinEtsuMicroSi**

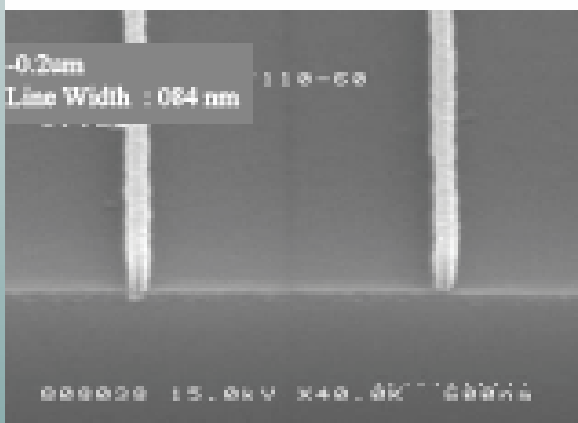
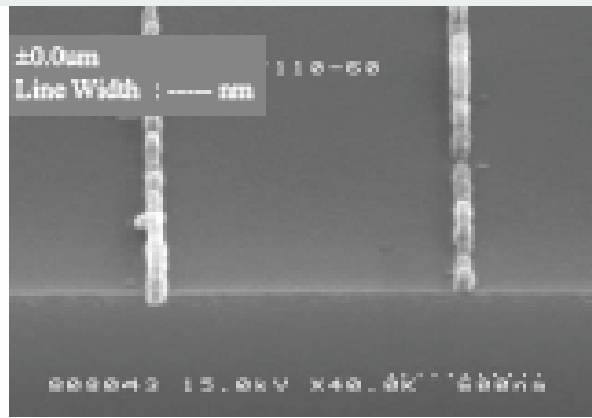
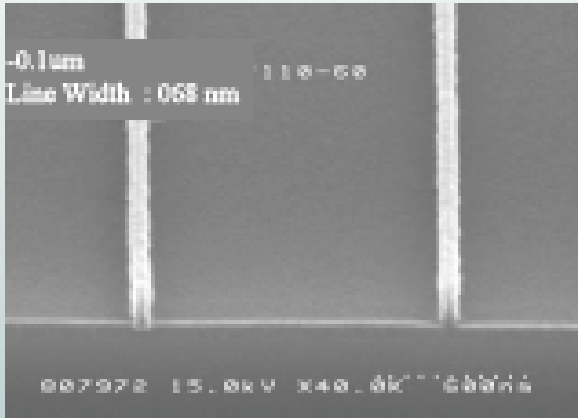
(FT:250 , Mask : 100nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 50mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:100nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])

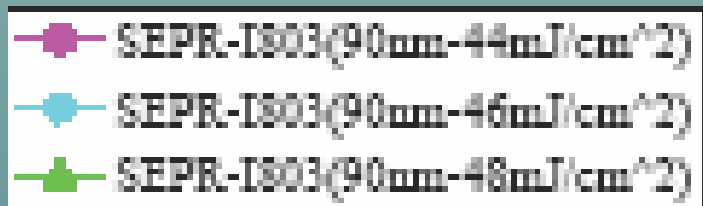
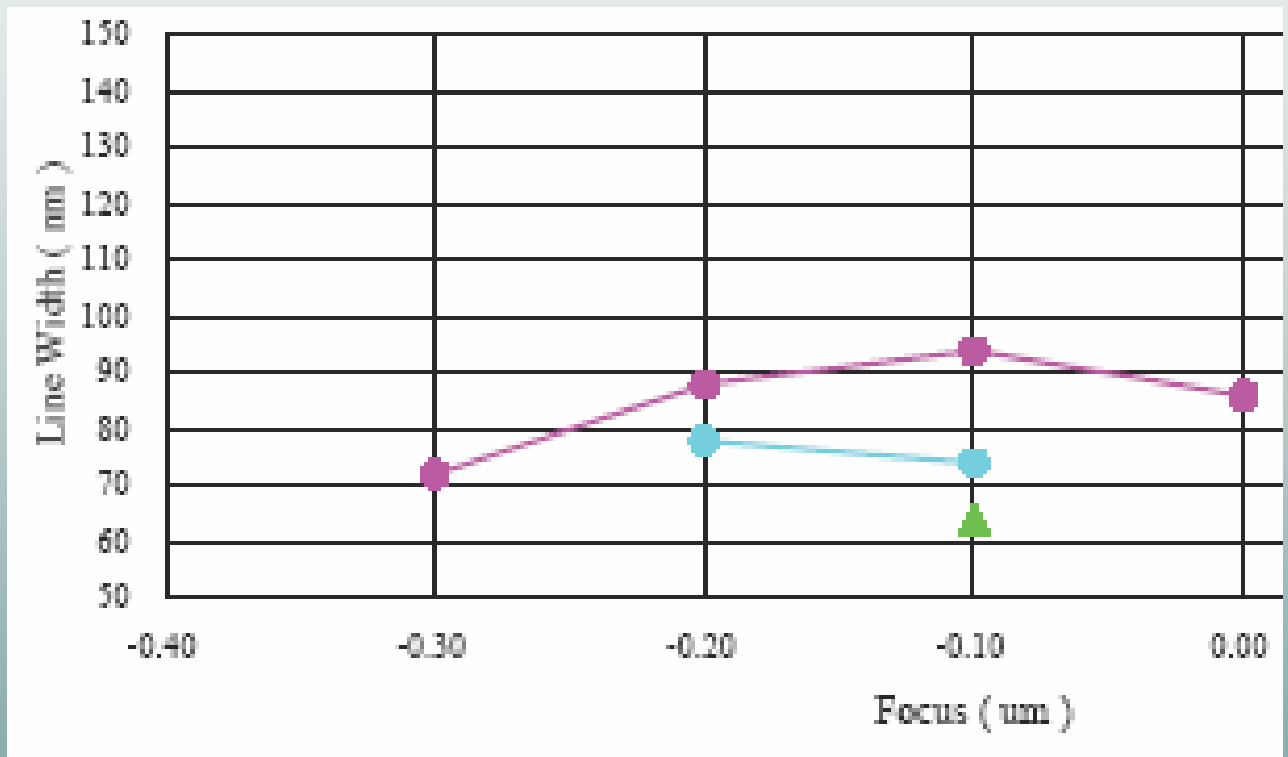


Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:90nm Line Focus: -0.4~+0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



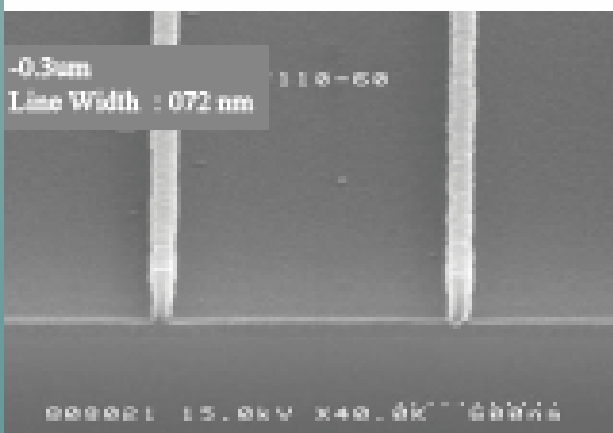
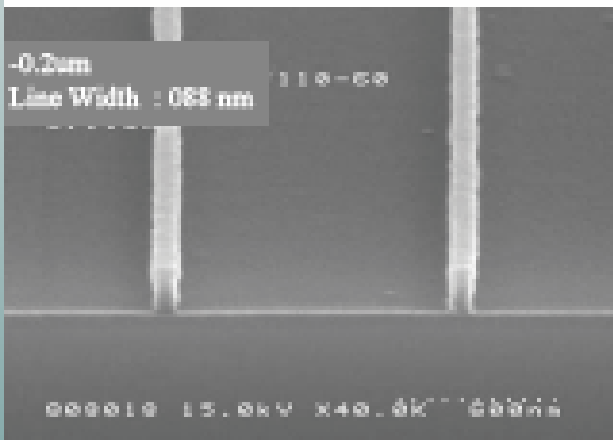
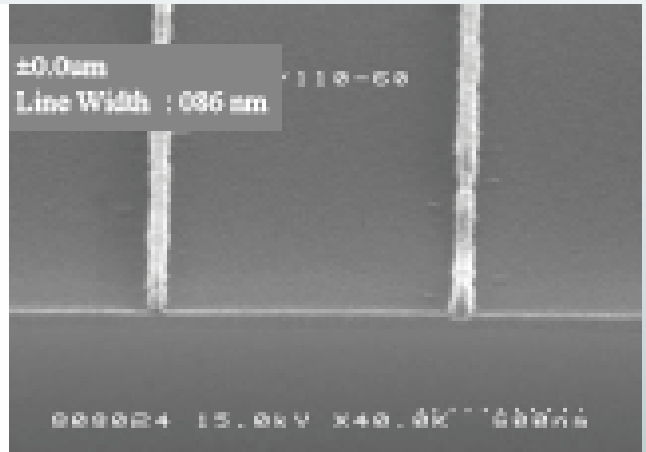
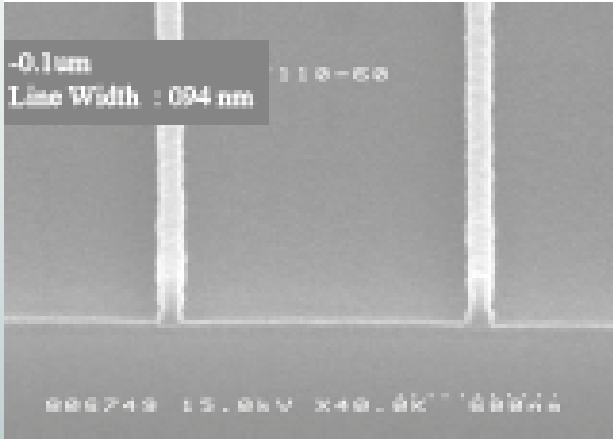
(FT:250 , Mask : 90nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 44mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:90nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])

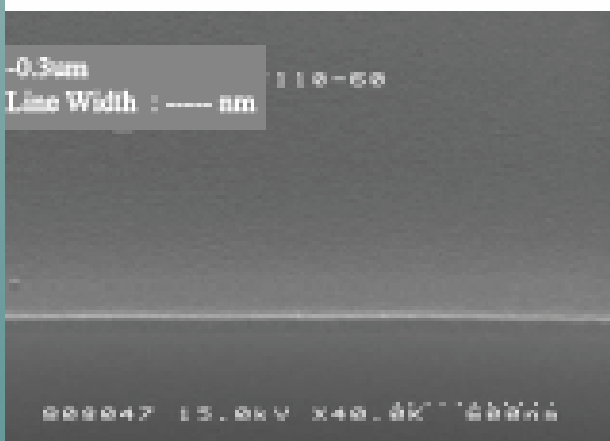
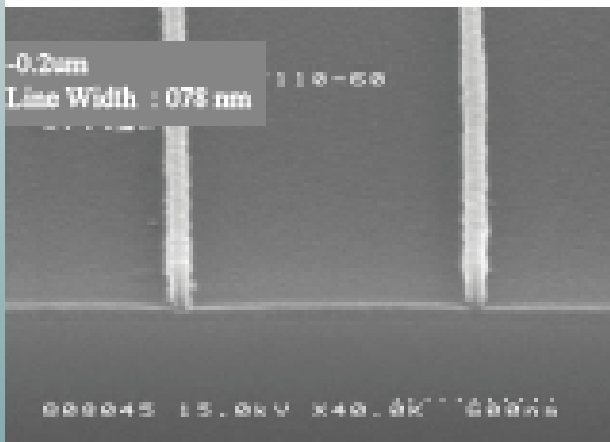
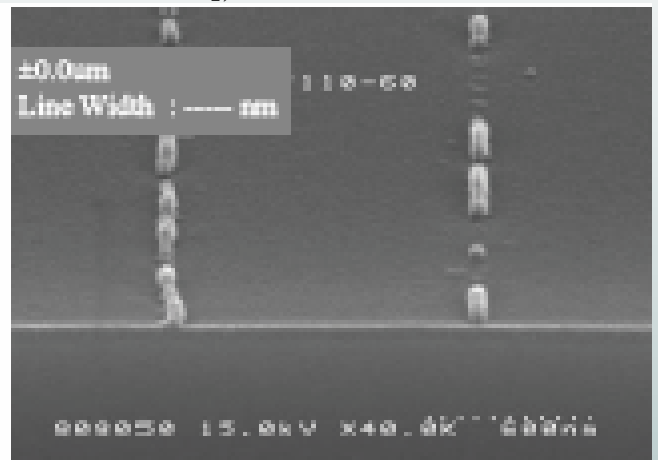
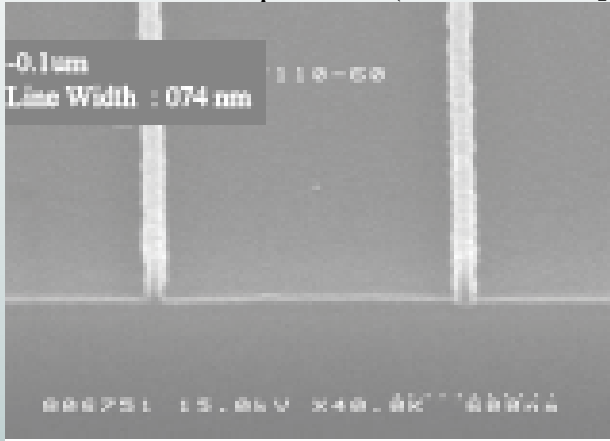


# SEPR- I803 DOF DUV-44 on Si Substrate



(FT:250 , Mask : 90nm)

Film Thickness:250nm Prebake: 110°Cx90 sec  
Exp.: 46mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )  
Mask:90nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec  
Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])



# SEPR- I803 DOF DUV-44 on Si Substrate



(FT:250 , Mask : 90nm)

Film Thickness:250nm Prebake: 110°Cx90 sec

Exp.: 48mJ/cm<sup>2</sup> (NSR-S203B , NA = 0.68,  $\sigma = 0.75$ )

Mask:90nm Line Focus: -0.3 ~ +0.2  $\mu\text{m}$  PEB: 110°C x 90 sec

Dev.: 60 sec x 1 puddle (SSFD-238N [TMAH = 2.38%])

