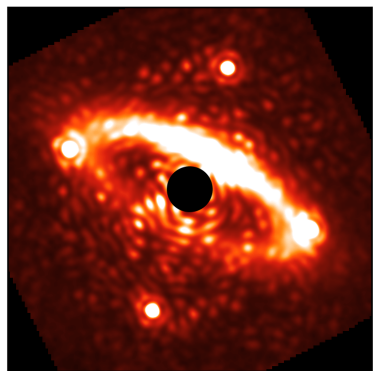


----- RDI Data -----

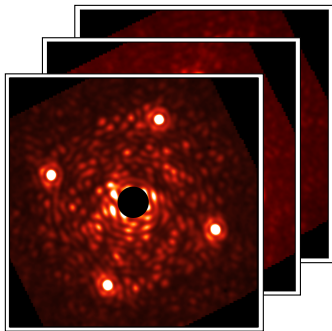
$$\mathbf{I} = \mathbf{I}_* + \mathbf{I}_c$$



Target Image  
(star + disk light)

$\mathbf{R}$

$\{\mathbf{R}_1, \mathbf{R}_2, \dots\}$

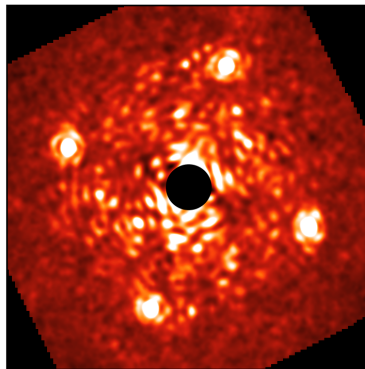


Reference Images  
(starlight only)

----- RDI PSF Subtraction -----

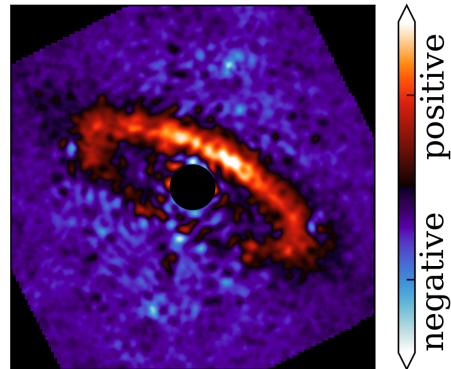
Build a model  
( $\mathbf{M}$ ) of the  
starlight in  $\mathbf{I}$   
as the linear  
combo of  
 $\{\mathbf{R}_1, \mathbf{R}_2, \dots\}$   
that best  
matches  $\mathbf{I}$

$$\mathbf{M}(\mathbf{I}, \mathbf{R})$$

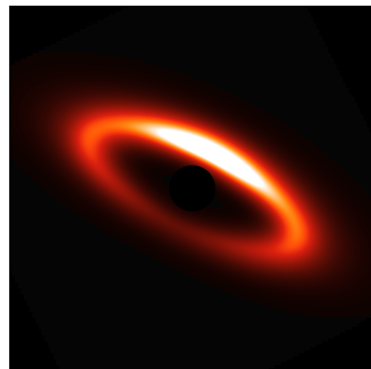


$\mathbf{M}$  is too bright as we're modeling starlight by  
fitting starlight to star+disk light: "oversubtraction"

$$\mathbf{I}_r = \mathbf{I} - \mathbf{M}$$



$\mathbf{I}_c$



True disk signal  
(desired result)