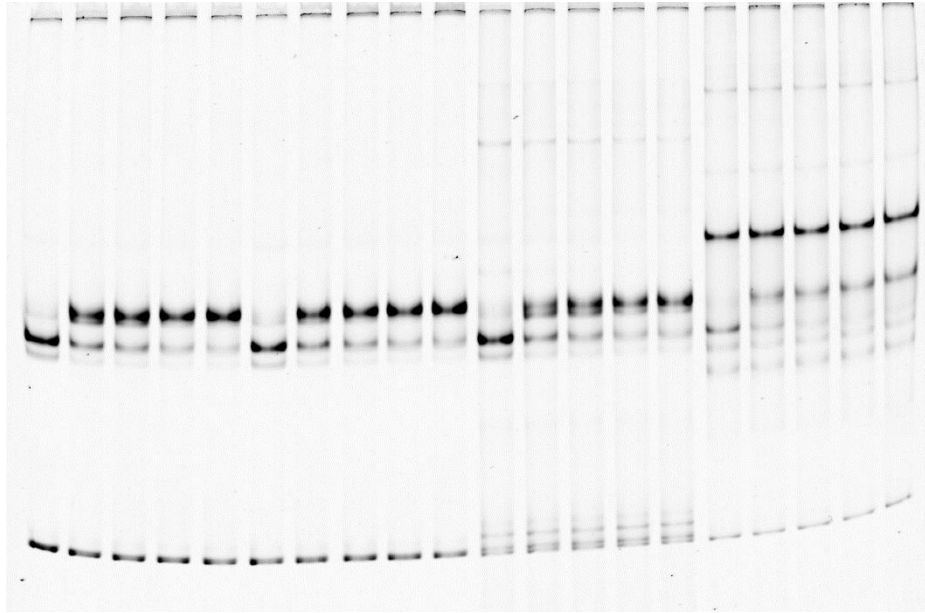
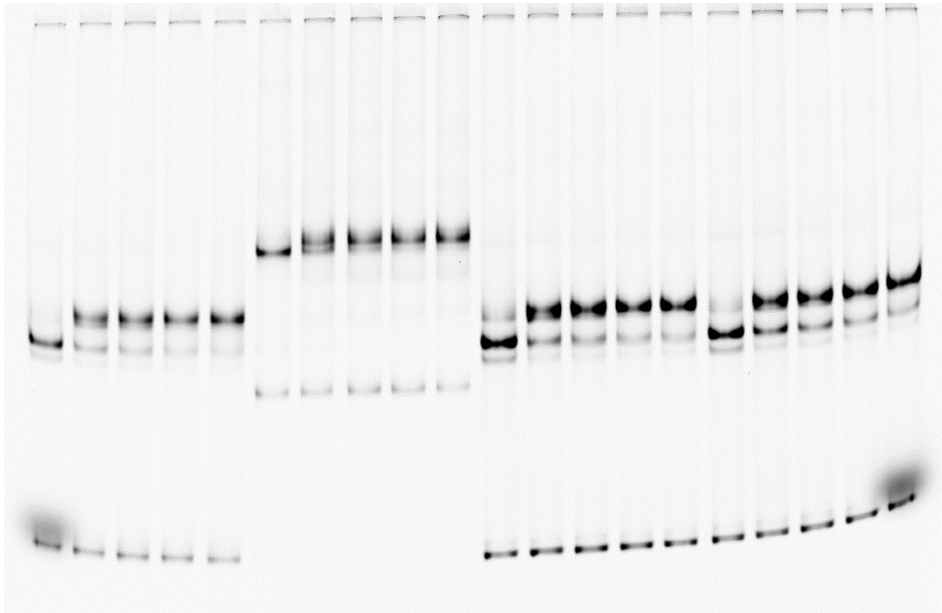


		Intact Nuc Cy3/					SHL+2biotin,Cy3/					Intact Nuc Cy5																		
		SHL-2biotin,Cy5																												
Streptavidin:	-	-	-	-	-	+	+	+	+	+	-	-	-	-	-	+	+	+	+	+	-	-	-	-	-	+	+	+	+	+
Time:	0	4	8	16	32	0	4	8	16	32	0	4	8	16	32	0	4	8	16	32	0	4	8	16	32	0	4	8	16	32

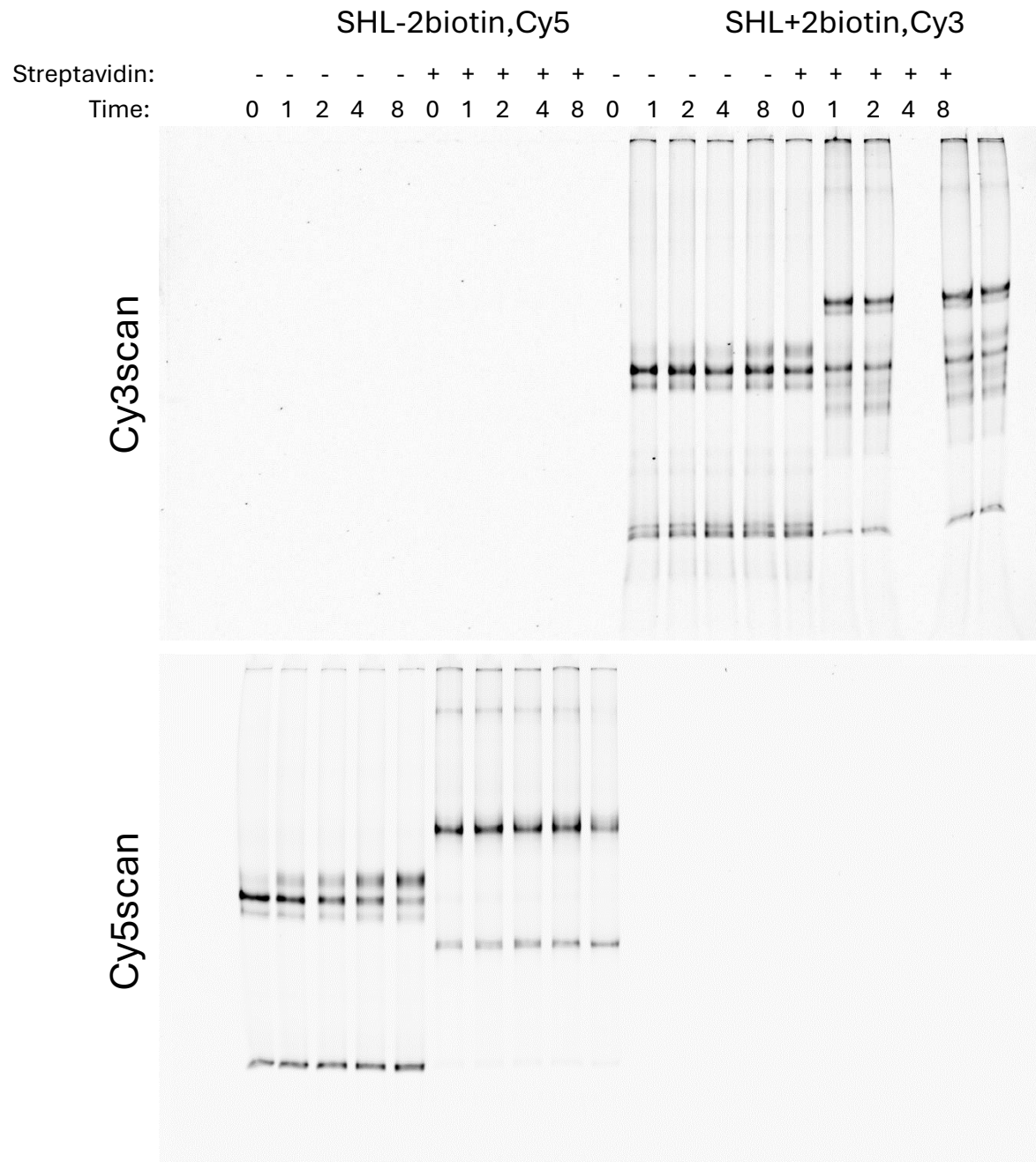
Cy3 scan



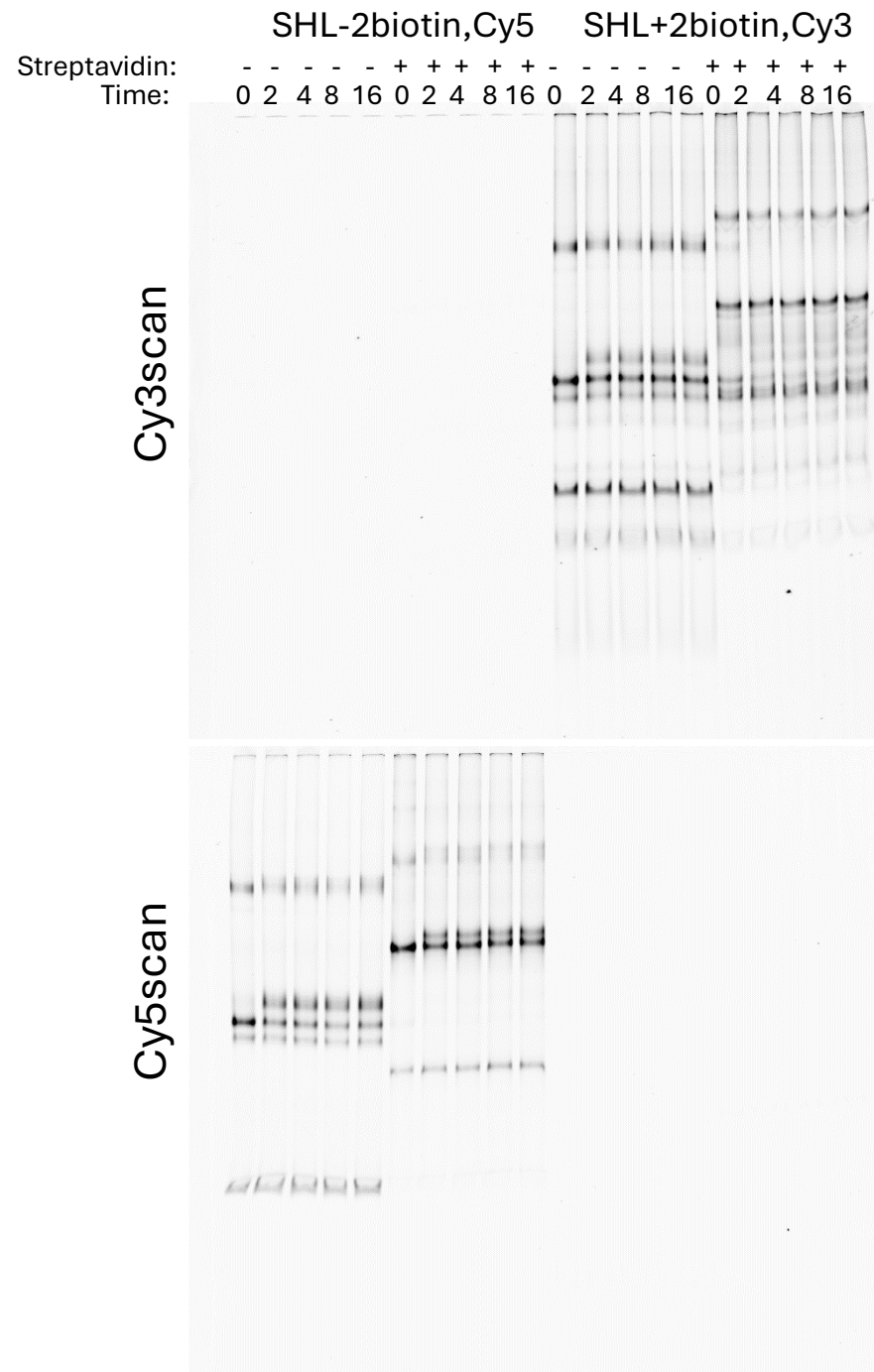
Cy5 scan



100nM biotin nucleosome  
 100nM wt nucleosome  
 1mM ATP  
 7nM yChd1 1-1305  
 +/- 1.6uM streptavidin



100nM biotin nucleosome  
 5nM yChd1 1-1305  
 1mM ATP  
 +/- 0.4uM streptavidin



100nM biotin nucleosome  
 300nM yChd1 1-1305  
 2.5uM ATP  
 +/-0.8uM streptavidin



Chd1:  
Streptavidin:  
Mapping:

SHL+2biotin,Cy3  
(bottom)

-	+	+	+	+
+	-	-	+	+
+	-	+	-	+

Intact Nuc  
Cy5

+	+	+
-	+	+
+	-	+

SHL-2biotin,Cy5  
(bottom)

-	+	+	+	+
+	-	-	+	+
+	-	+	-	+

Initial loc  
10 bp shift  
20 bp shift

100nM nucleosome  
7nM yChd1 1-305  
1mM ATP  
+/-1.6uM streptavidin

Time:  
Streptavidin:  
Mapping:

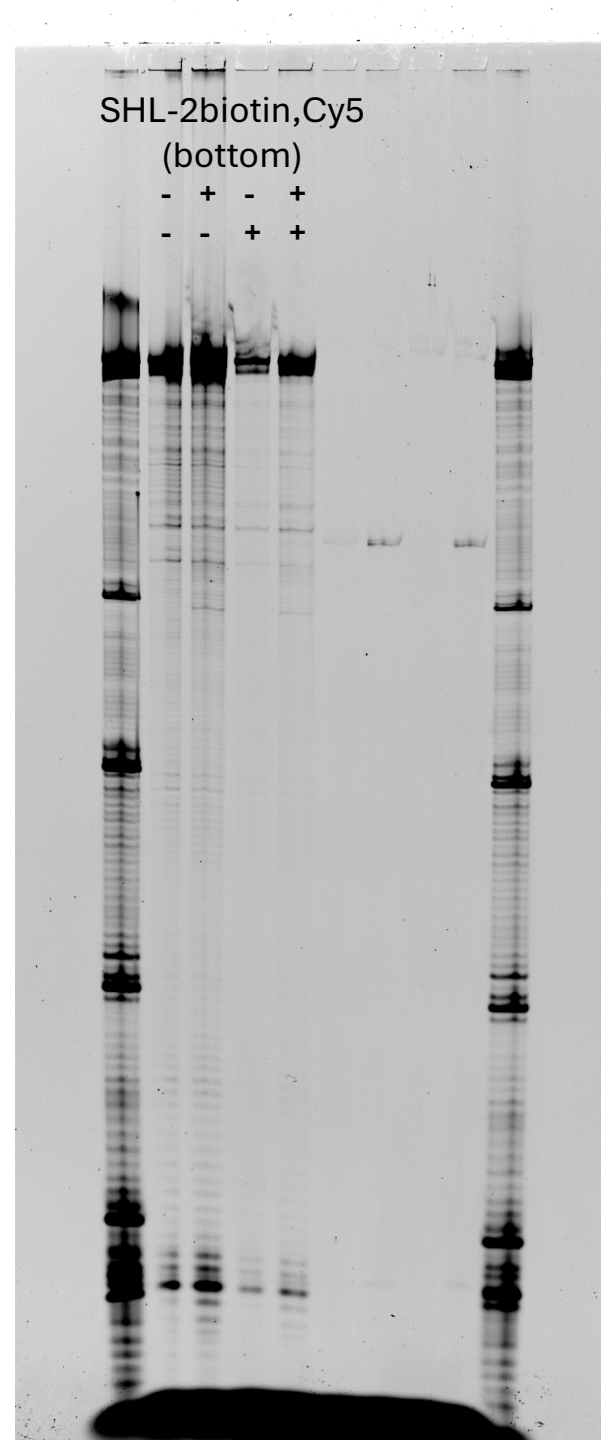
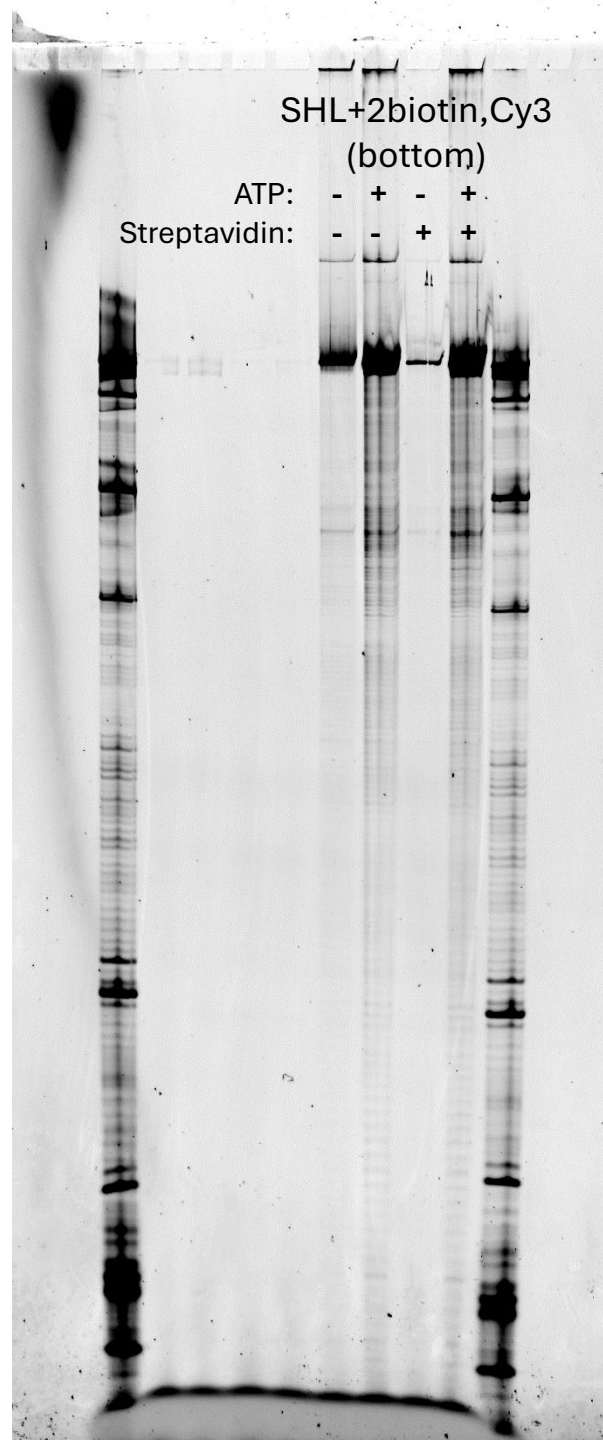
SHL+2biotin,Cy3  
(bottom)  
0 0 8 8 8 8  
- + - - + +  
+ + - + - +

SHL-2biotin,Cy5  
(bottom)  
0 0 8 8 8 8  
- + - - + +  
+ + - + - +

Intial loc  
10 bp shift  
20 bp shift, centre

100nM nucleosome  
5nM yChd1 1-1305  
1mM ATP  
+/- 0.4uM streptavidin





Initial loc

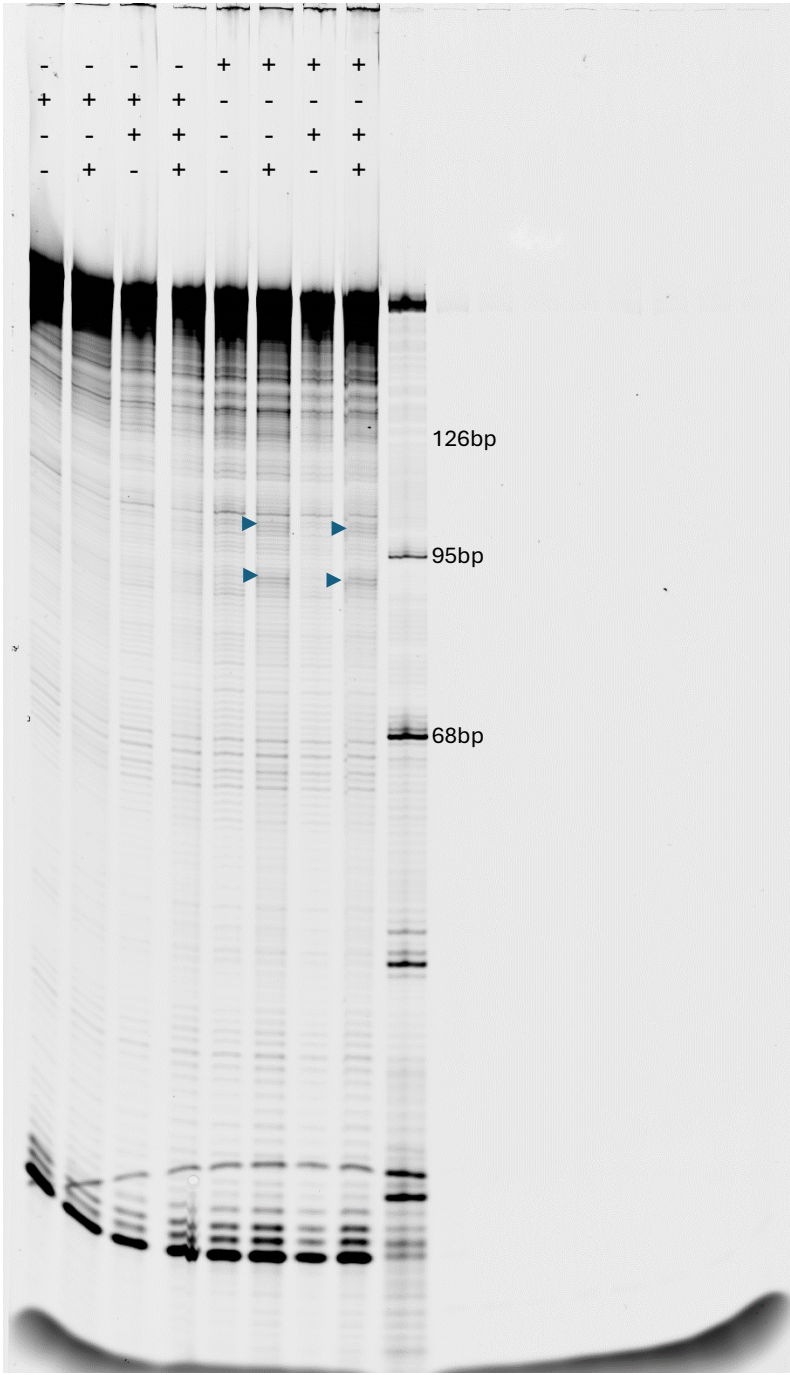
20 bp shift, centre

100nM nucleosome  
300nM yChd1 1-1305  
2.5uM ATP  
16 minute sliding @30C  
+/-0.8uM streptavidin

SHL-2biotin,Cy5 (bottom)

ATP (7.5uM):	-	-	-	-	+	+	+	+
ADP-BeF (1.5uM):	+	+	+	+	-	-	-	-
SA (0.8uM)	-	-	+	+	-	-	+	+
Mapping:	-	+	-	+	-	+	-	+

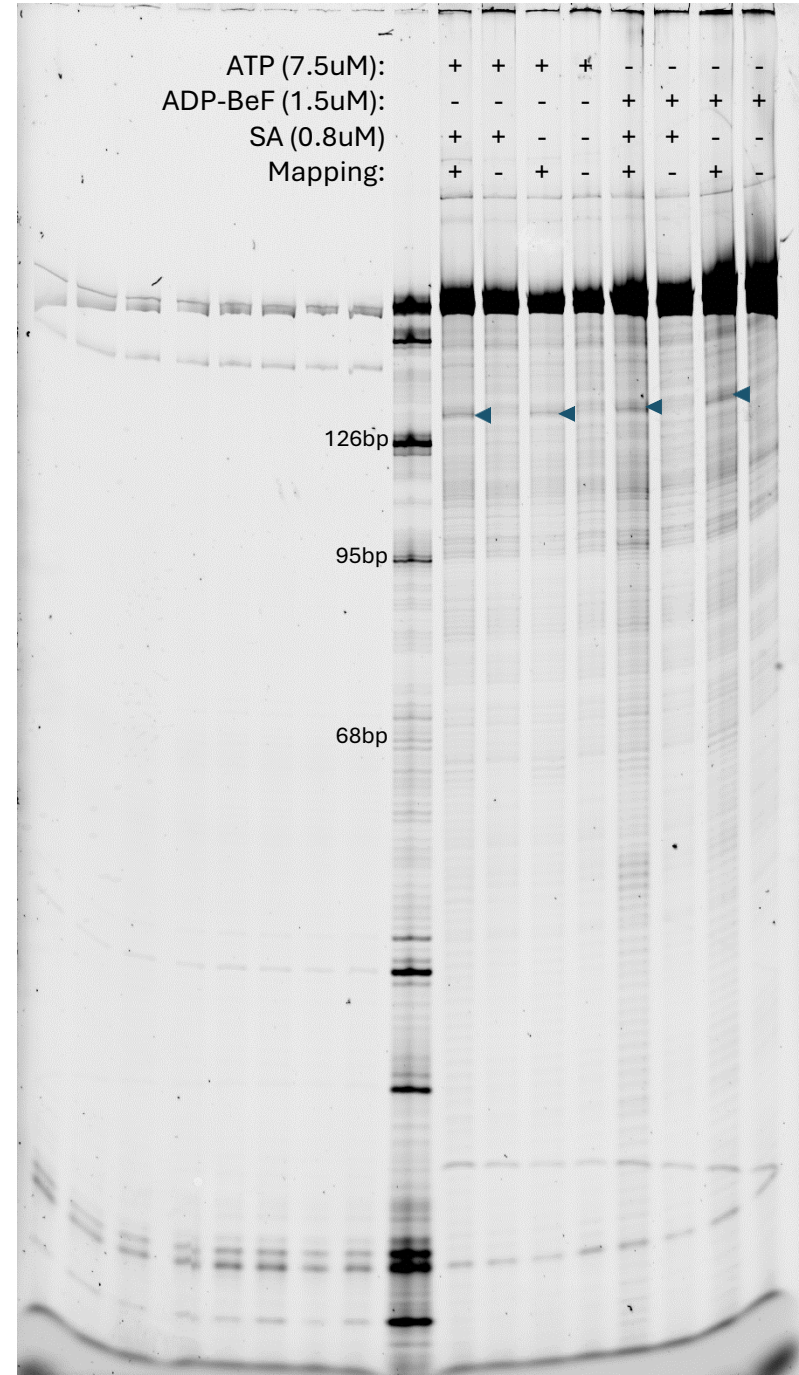
+21  
+32



SHL+2biotin,Cy3 (bottom)

ATP (7.5uM):	+	+	+	+	-	-	-	-
ADP-BeF (1.5uM):	-	-	-	-	+	+	+	+
SA (0.8uM)	+	+	-	-	+	+	-	-
Mapping:	+	-	+	-	+	-	+	-

-15





SHL-2biotin,Cy5 (bottom)

**Fe site:**

ATP (2.5uM):

ADP-BeF (1.5uM):

SA(0.8uM):

**524****-**

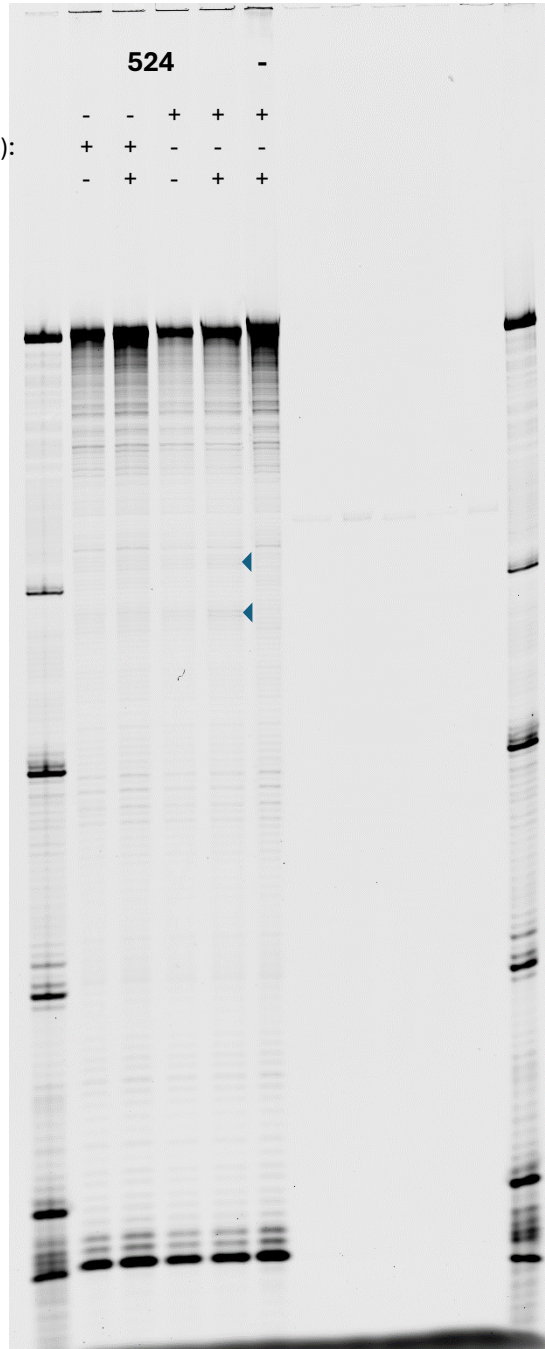
- - + + +

+ + - - -

- + - + +

+21

+32



SHL+2biotin,Cy3 (bottom)

**524****-**

ATP (2.5uM):

ADP-BeF (1.5uM):

SA(0.8uM):

- - - + + +

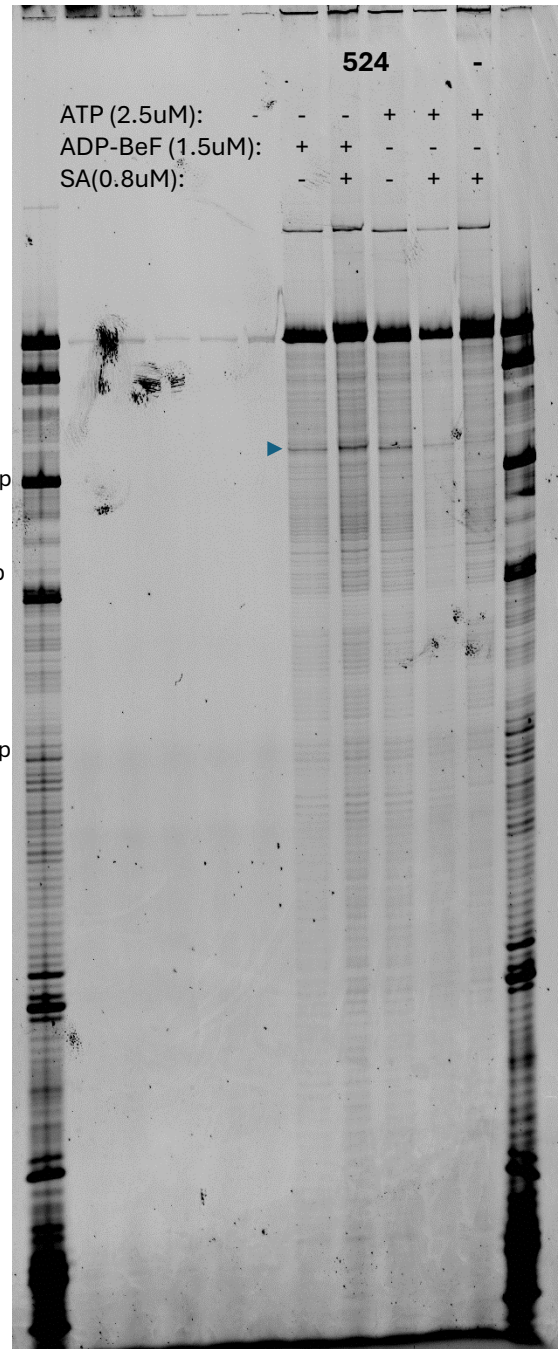
+ + - - -

- + - + +

126bp

95bp

68bp



-15