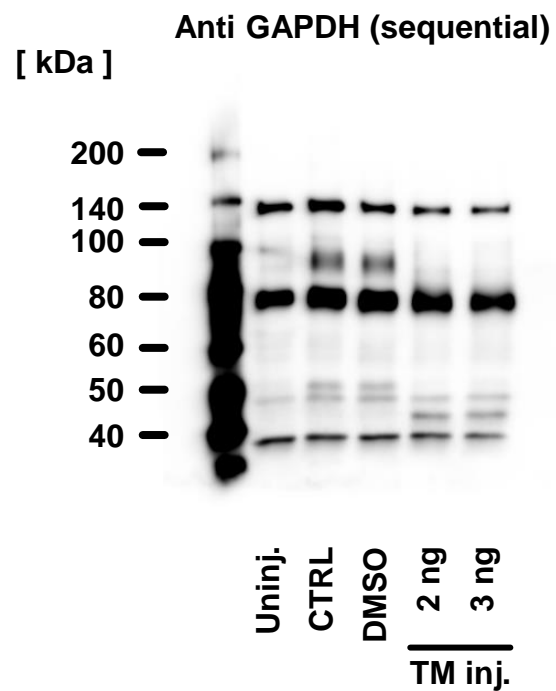
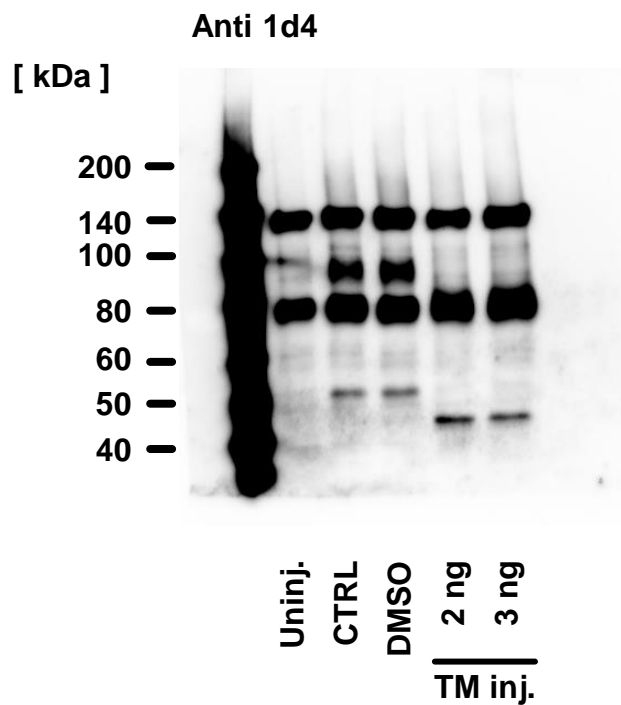


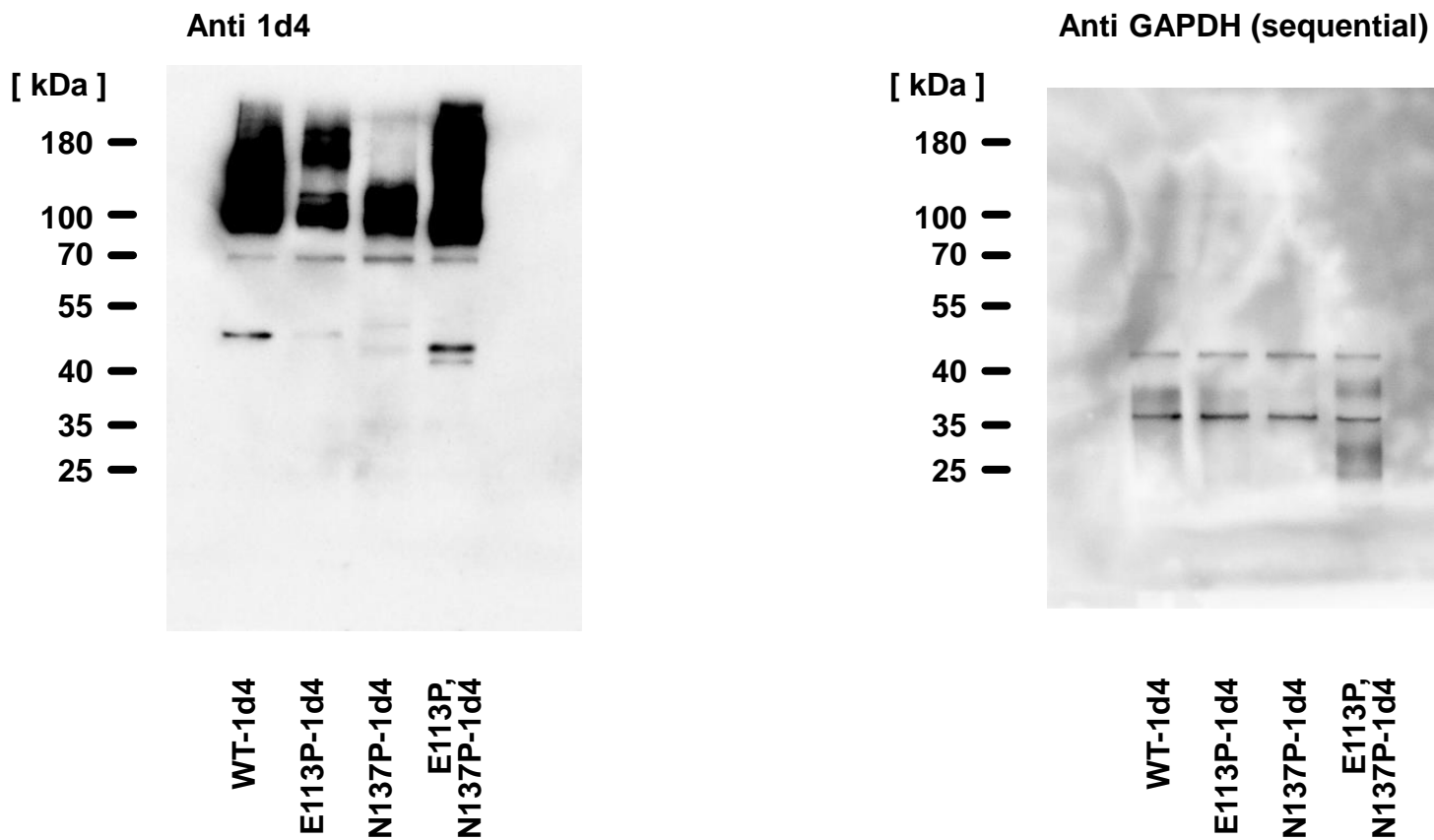
## Supplementary figure 1

Western blot: Tunicamycin treatment of TREK-1, expressed in *Xenopus* oocytes:  
(from figure 2a)



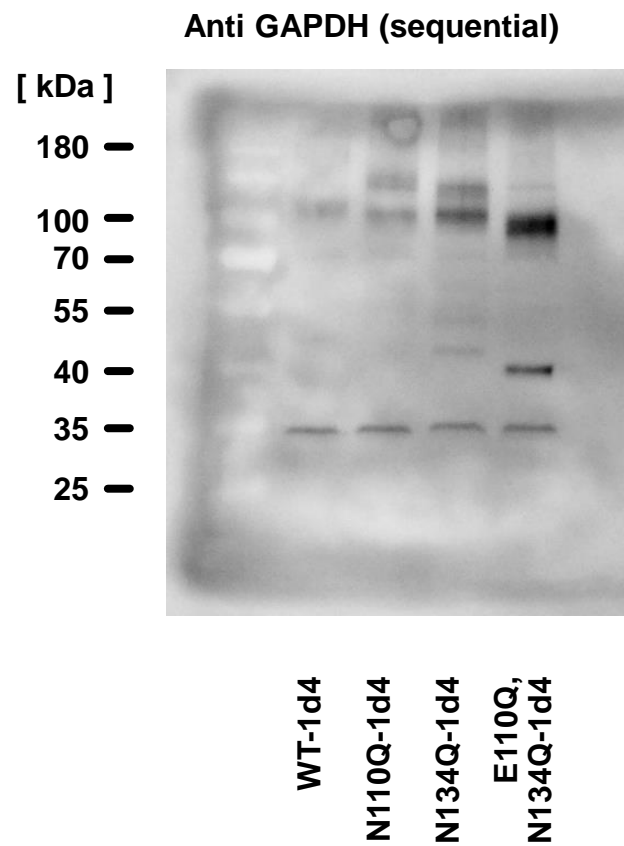
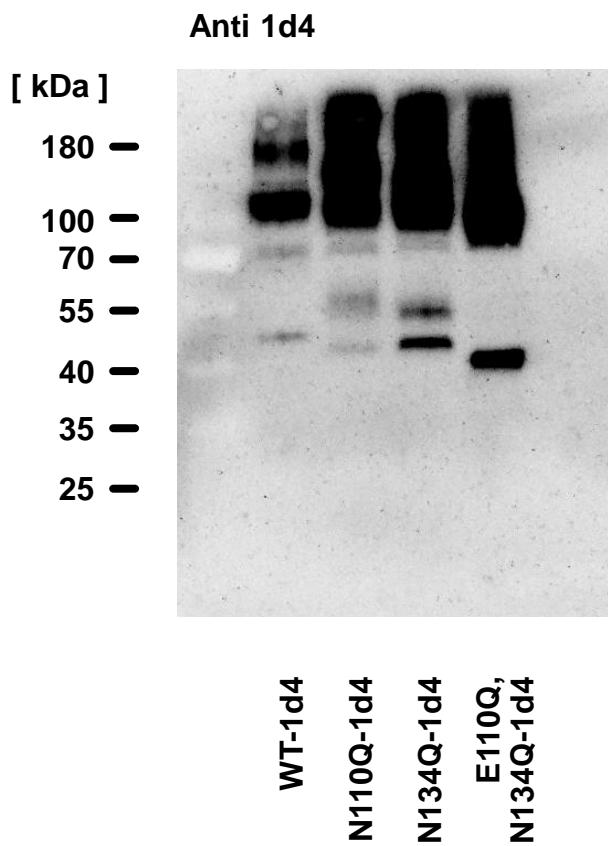
## Supplementary figure 2

Western blot: Glycosylation deficient TREK-1 mutants, expressed in *Xenopus* oocytes:  
(from figure 3a)



### Supplementary figure 3

Western blot: Glycosylation deficient TREK-1 mutants, expressed in *Xenopus* oocytes:  
(from figure 3b)

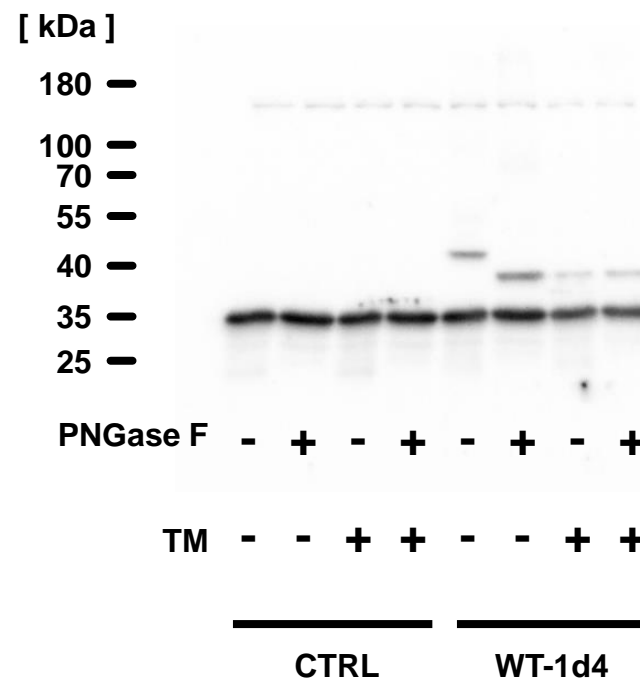
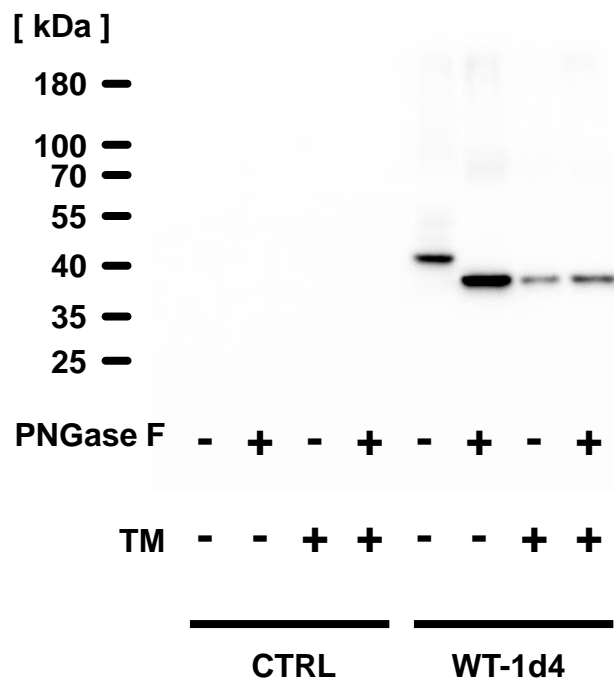


## Supplementary figure 4

Western blot: PNGase F and tunicamycin treatment of TREK-1, expressed in HEK 293T cells:  
(from figure 4a)

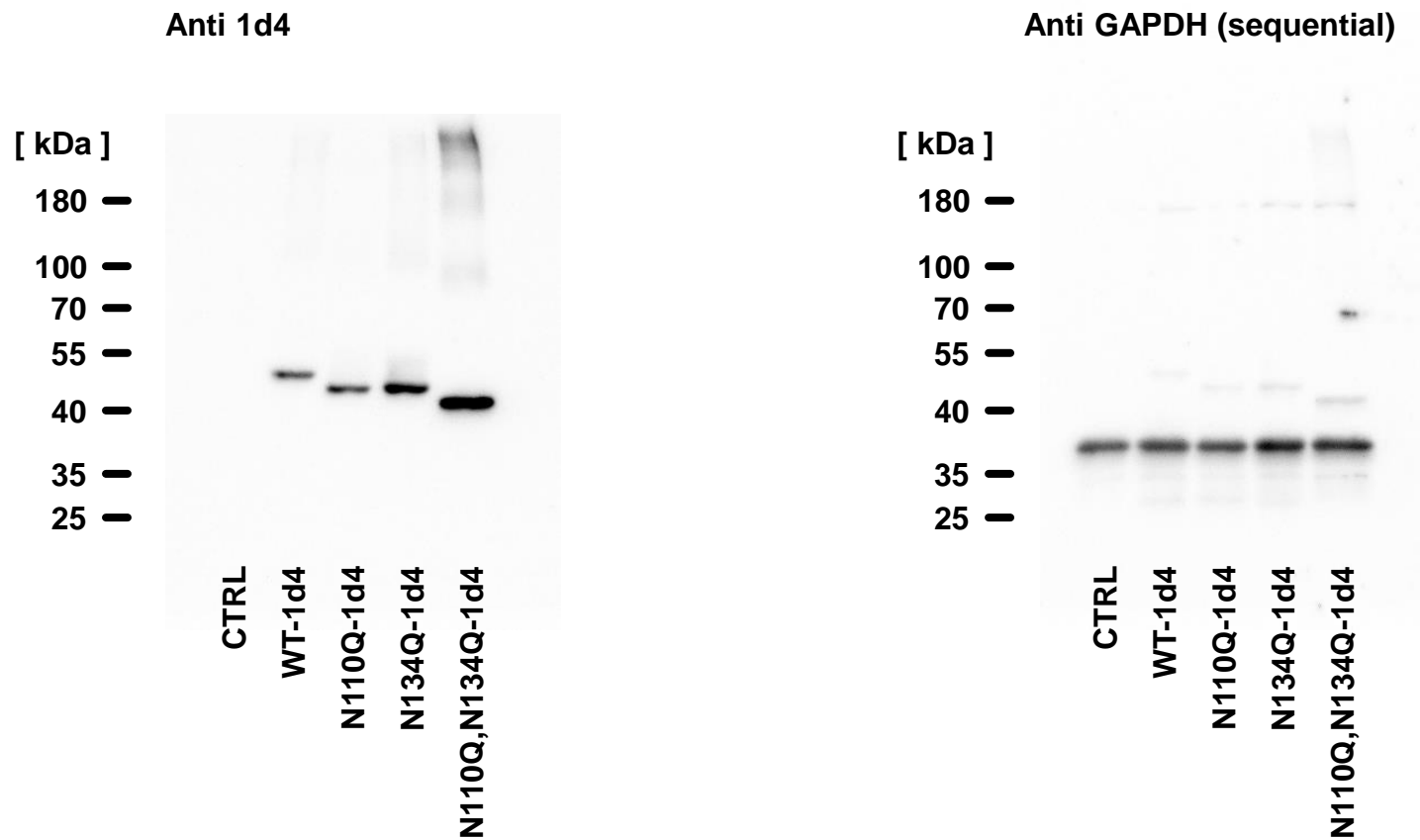
Anti 1d4

Anti GAPDH (sequential)



## Supplementary figure 5

Western blot: Glycosylation deficient TREK-1 mutants, expressed in HEK 293T cells:  
(from figure 4b)

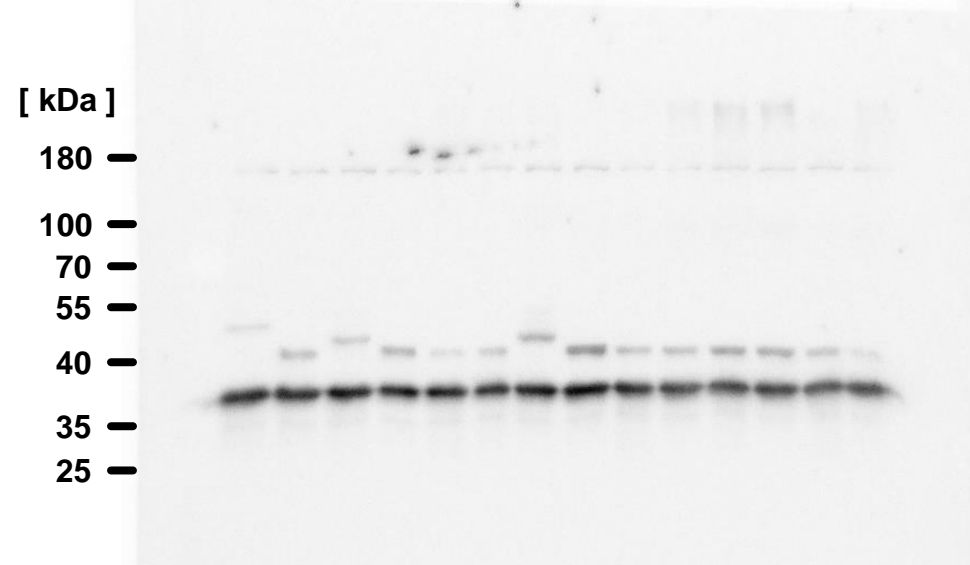
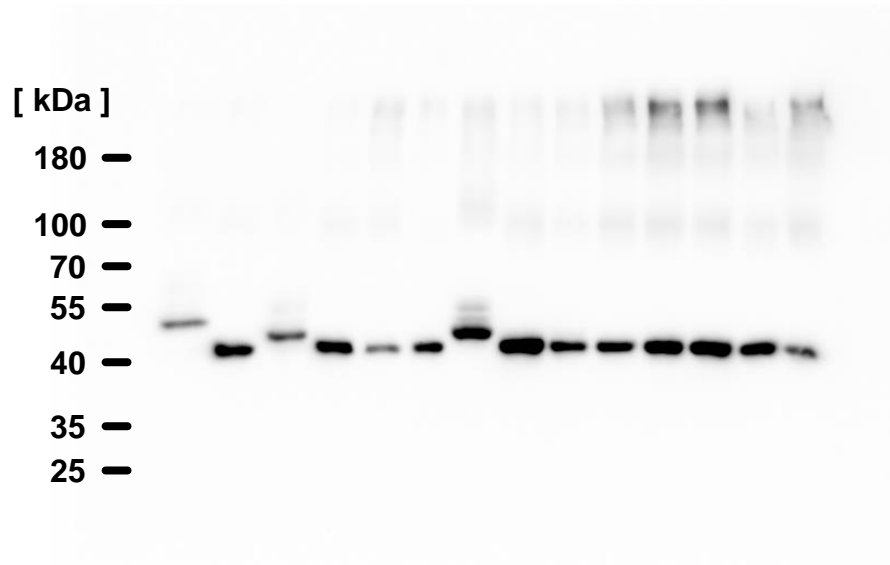


## Supplementary figure 6

Western blot: PNGase F and tunicamycin treatment of glycosylation deficient TREK-1 mutants:  
(from figure 4c)

Anti 1d4

Anti GAPDH (sequential)



PNGase F - + - + - + - + - + - + - +

PNGase F - + - + - + - + - + - + - +

TM - - - + + - - + + - - + +

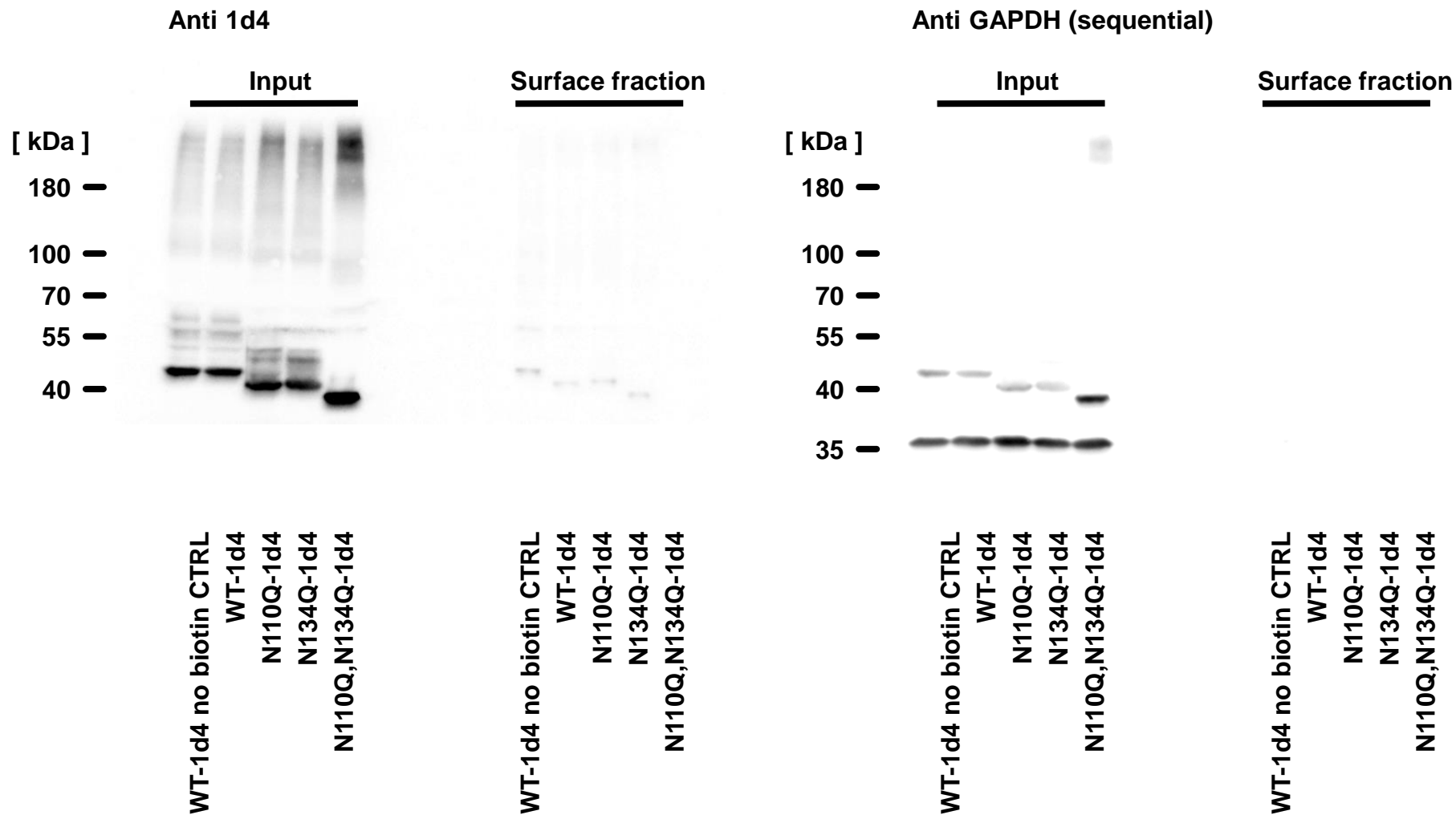
TM - - - + + - - + + - - + +

WT-1d4      N110Q-1d4      N134Q-1d4      N110Q, N134Q-1d4

WT-1d4      N110Q-1d4      N134Q-1d4      N110Q, N134Q-1d4

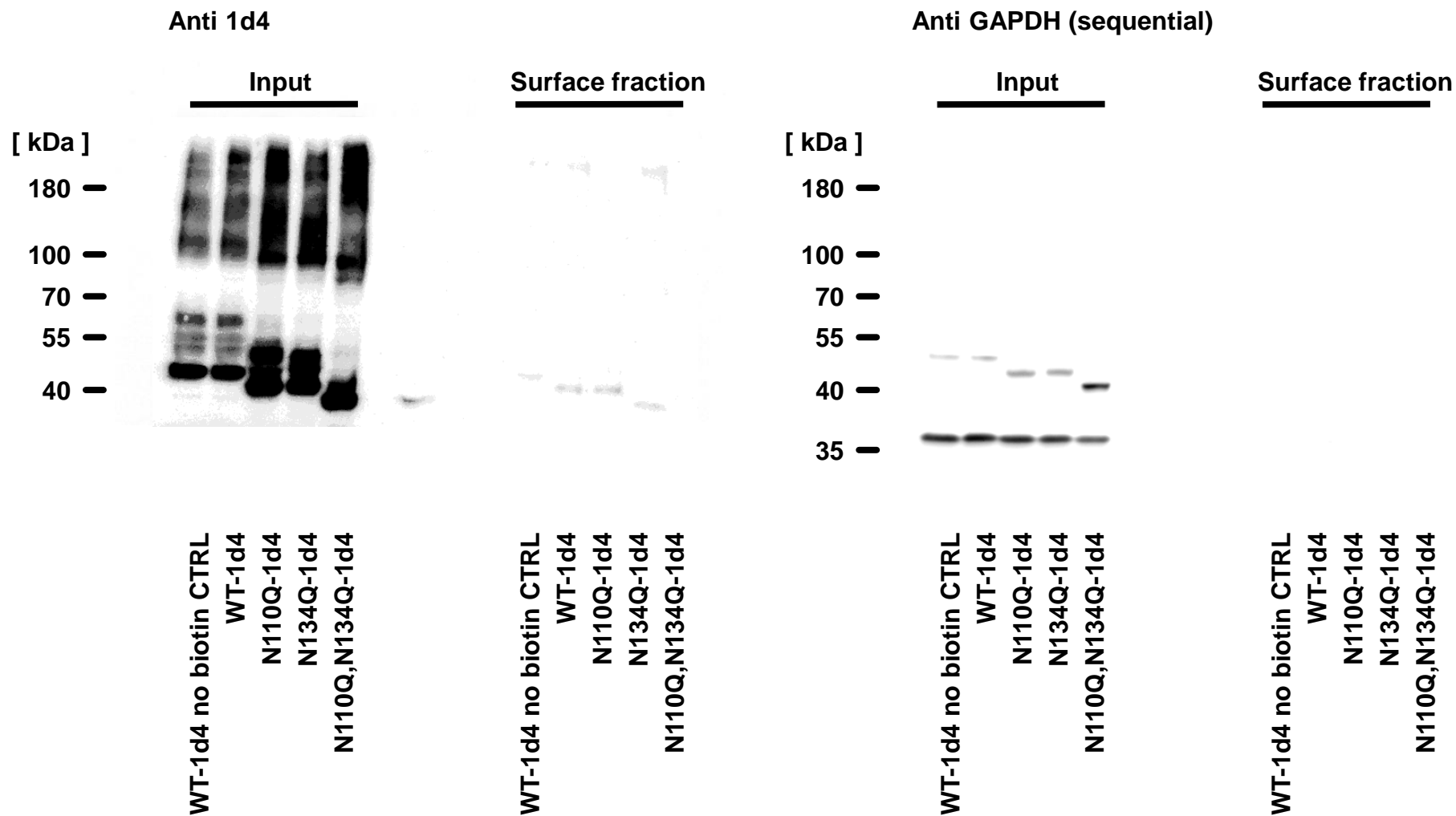
## Supplementary figure 7

### Western blot membrane 1: Surface expression (from figure 5b):



## Supplementary figure 8

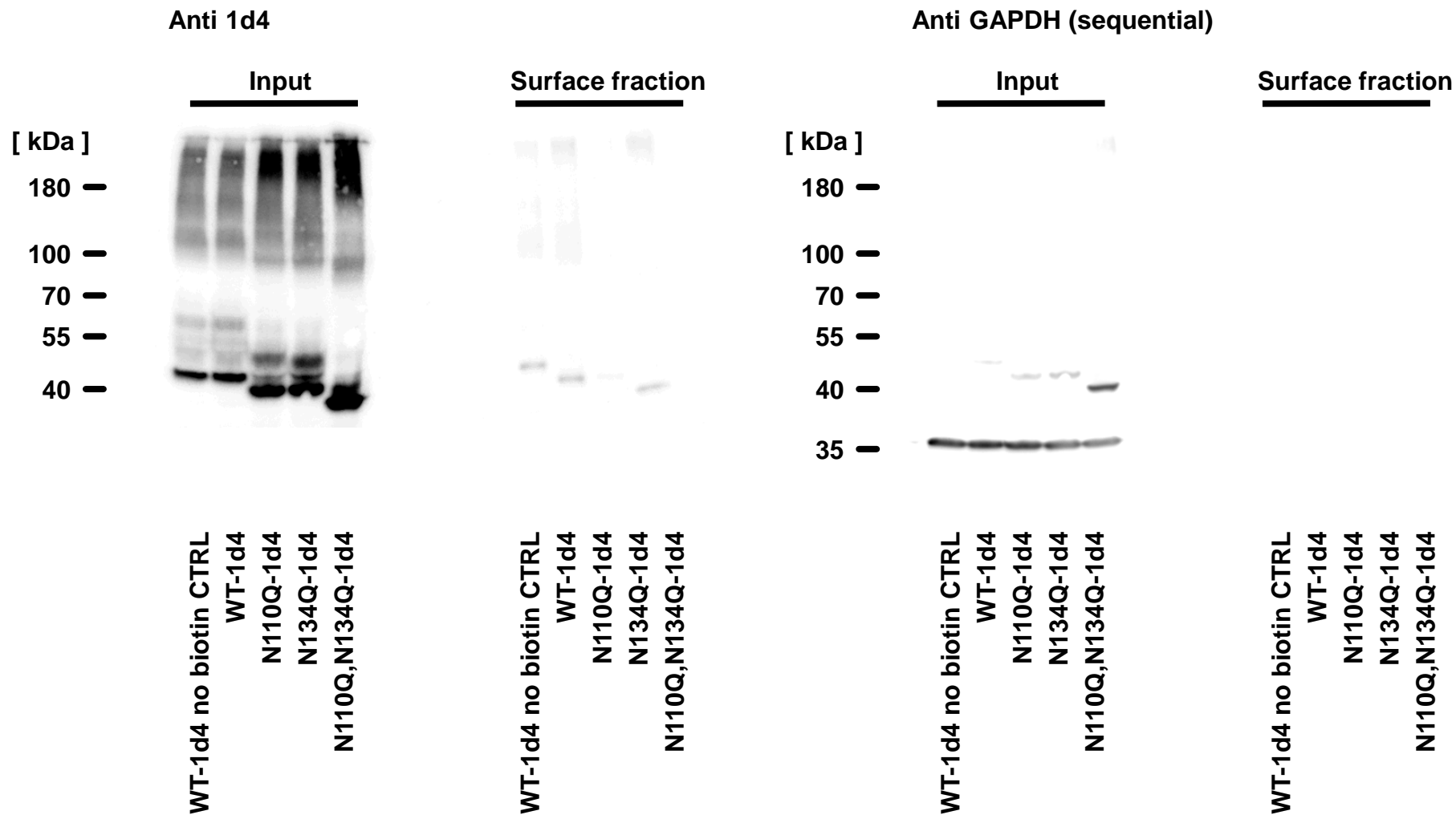
### Western blot membrane 2: Surface expression (from figure 5b):





## Supplementary figure 9

### Western blot membrane 3: Surface expression (from figure 5b):



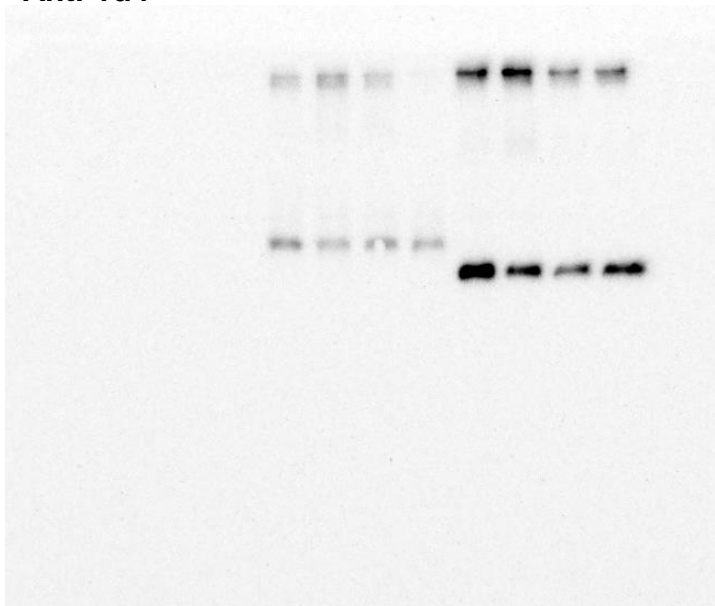
# Supplementary figure 10

## Western blot membrane: O-glycosylation of TREK-1 (from figure 6)

Anti 1d4

[ kDa ]

180 —  
100 —  
70 —  
55 —  
40 —  
35 —  
25 —

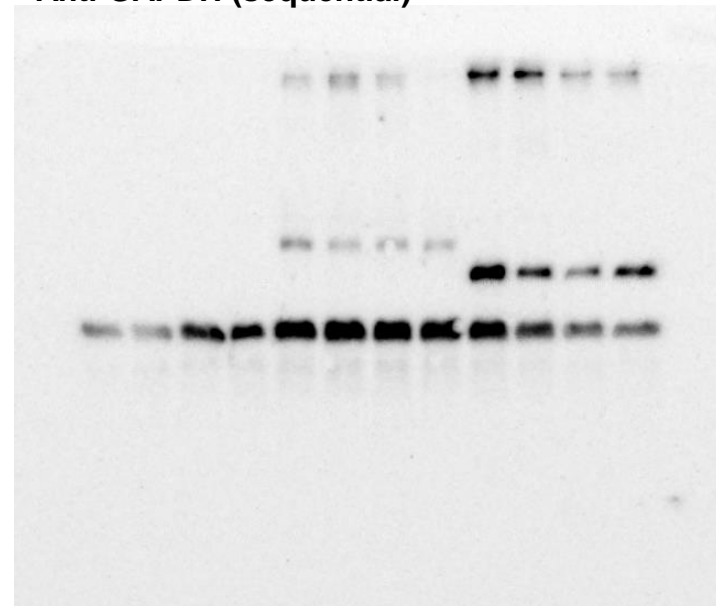


Neuraminidase + O-glycosidase	-	+	-	+	-	+	-	+	-	+	-	+
BenGal	-	-	+	+	-	-	+	+	-	-	+	+
	_____				_____				_____			
	CTRL				WT-1d4				N110Q, N134Q-1d4			

Anti GAPDH (sequential)

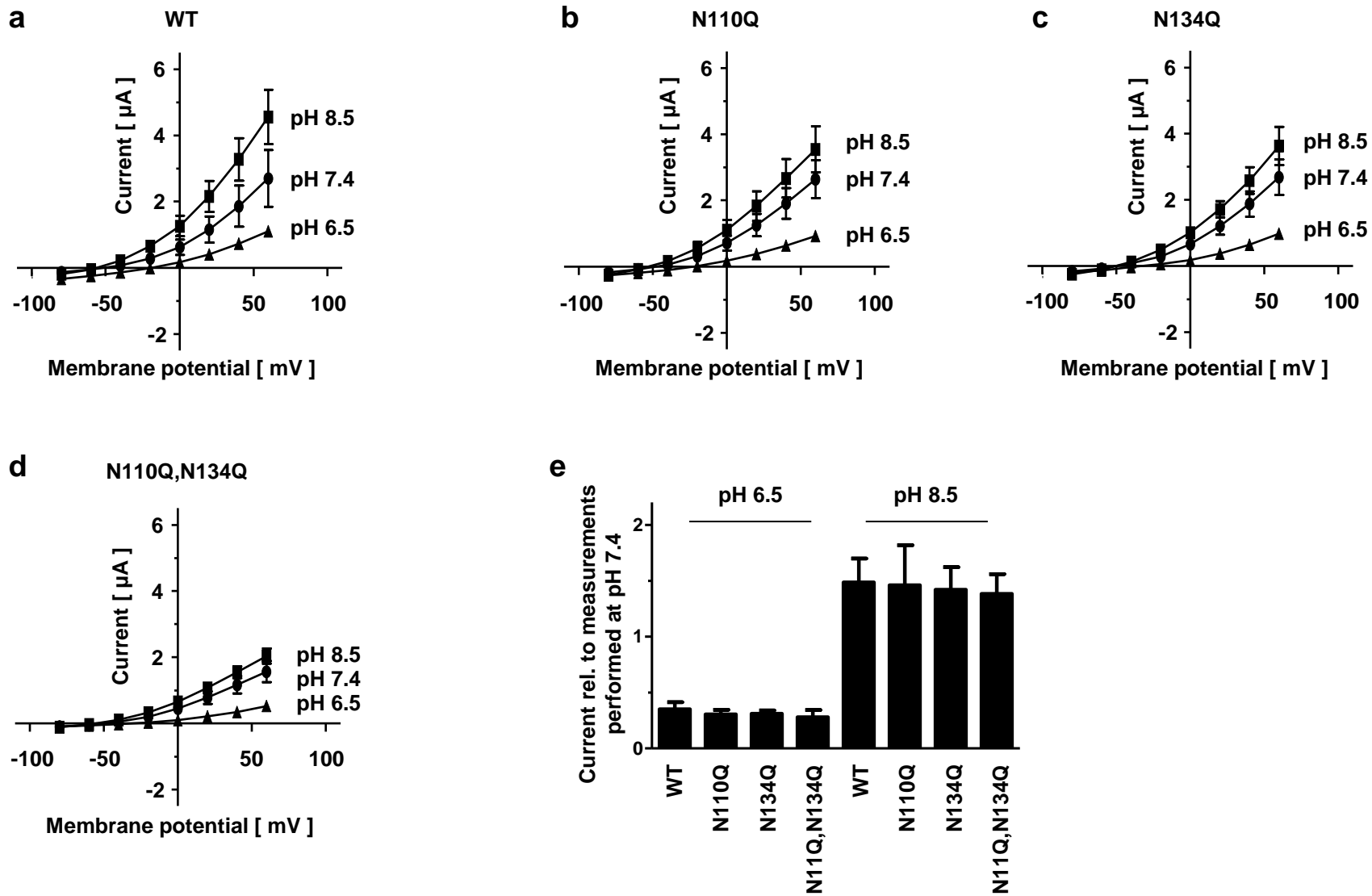
[ kDa ]

180 —  
100 —  
70 —  
55 —  
40 —  
35 —  
25 —

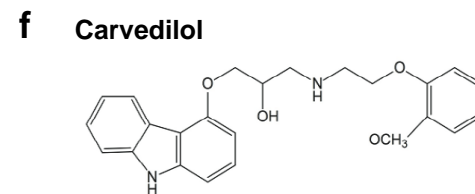
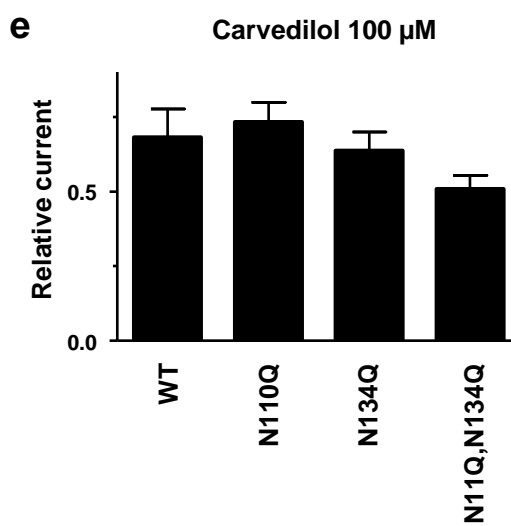
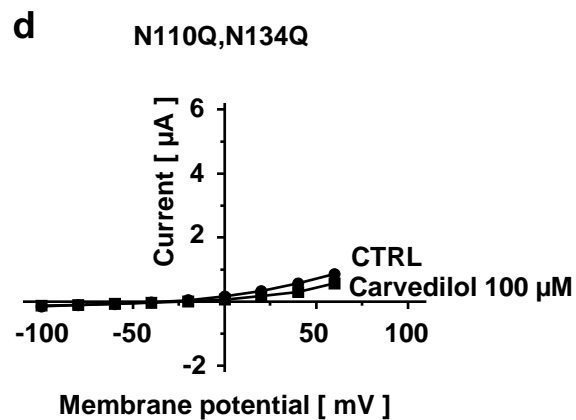
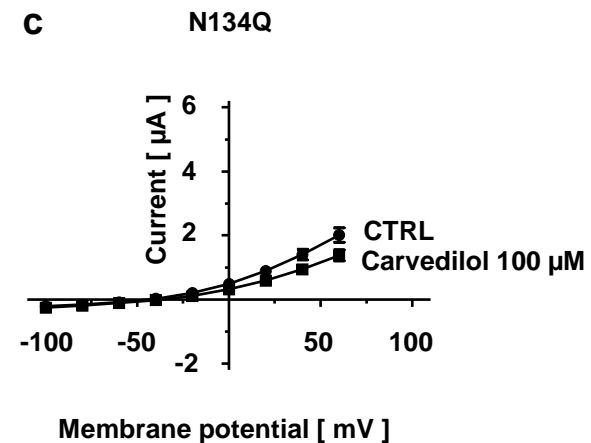
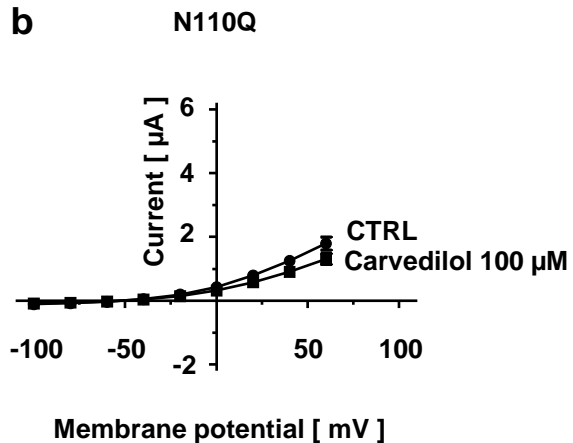
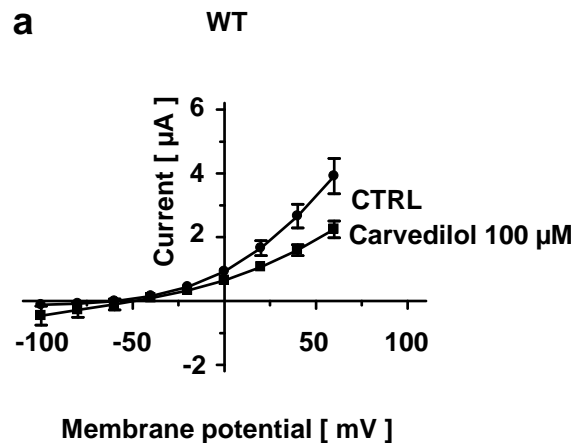


Neuraminidase + O-glycosidase	-	+	-	+	-	+	-	+	-	+	-	+
BenGal	-	-	+	+	-	-	+	+	-	-	+	+
	_____				_____				_____			
	CTRL				WT-1d4				N110Q, N134Q-1d4			

# Supplementary figure 11



# Supplementary figure 12



# Supplementary figure 13

