

Plasmid ID	Gene targeted	Talen Sequence (Left talen/spacer/right talen)	binding sequences				tag	Method
			Segment I.	Segment II.	Segment III.	Segment IV.		
SD_14	SORL1_ATG-Left Set1	T GCAGTAGCGTTTCGCC cgaacatggcgacac GGAGCAGCAGGAGGG A	GCAG	TAGC	GTTC	GCC	GFP	Musunuru-Cowan
SD_15	SORL1_ATG-right Set1	T GCAGTAGCGTTTCGCC cgaacatggcgacac GGAGCAGCAGGAGGG A	CCCT	CCTG	CTGC	TCC	RFP	Musunuru-Cowan

NI-A NK/NN-G NG-T HD-C

SD_14 GFP SORL1 ATG

forward

AVHAWRNALTGAPLNLTPQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NI**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NI**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLP

NN-HD-NI-NN-NG-NI-NN-HD-NN-NG-NG

GCAG TAGC GTT

reverse

ETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NI**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQAL
ETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGRPALESIVAQ

NG-NI-NN-HD-NN-NG-NG-HD-NN-HD-HD

TAGC GTTC GCC

GCAG TAGC GTTC GCC

NI-A NK/NN-G NG-T HD-C

SD_15 RFP SORL1 ATG

forward

LTGAPLNLTPQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLP
VLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLP
VLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLP
VLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLP
VLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLP
VLC

HD-HD-HD-NG-HD-HD-NG-NN-HD-NG

CCCT CCTG CT

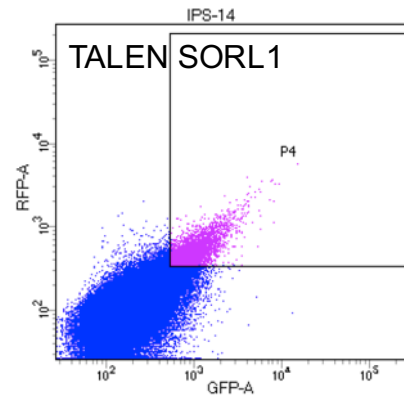
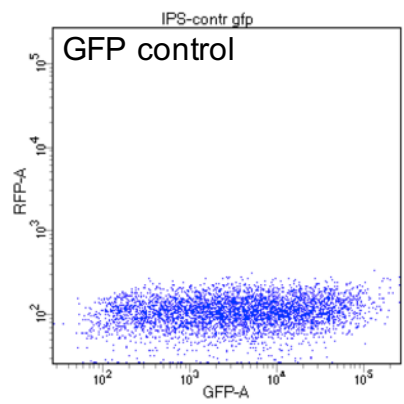
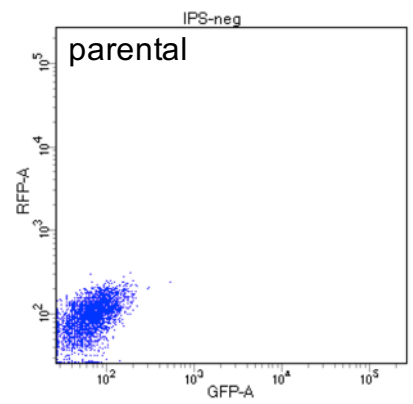
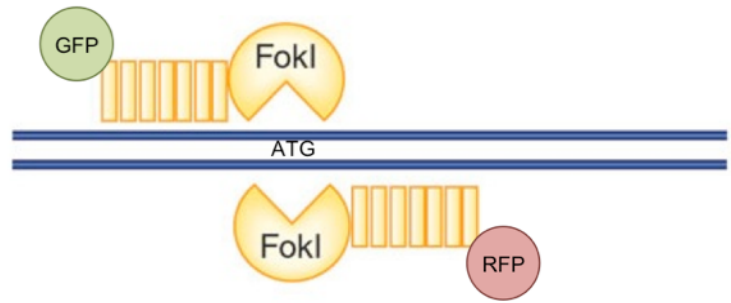
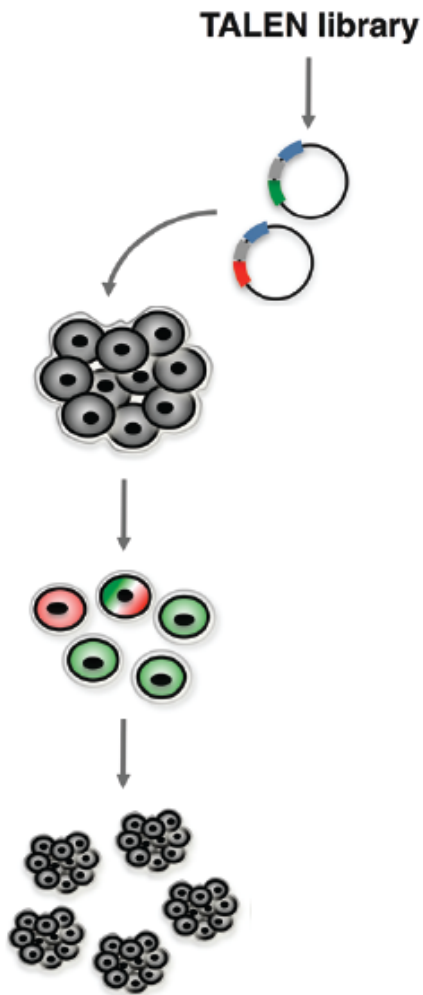
reverse

TPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGL
TPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGL
TPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGL
TPEQVVAIAS**NN**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGL
TPEQVVAIAS**NG**GGKQALETVQRLLPVLCQAHGLTPEQVVAIAS**HD**GGKQALETVQRLLPVLCQAHGL
TPEQVVAIAS**HD**GGRPALESIVAQ

HD-HD-NG-NN HD-NG-NN-HD NG-HD-HD-

CCTG CTGC TCC

CCCT CCTG CTGC TCC

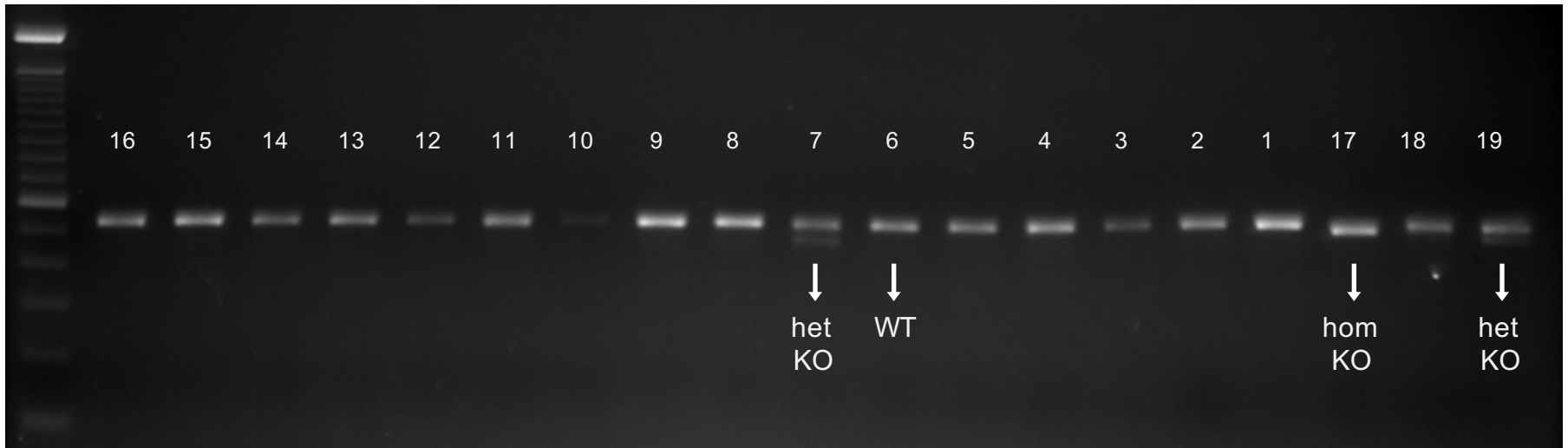


Primer for screening

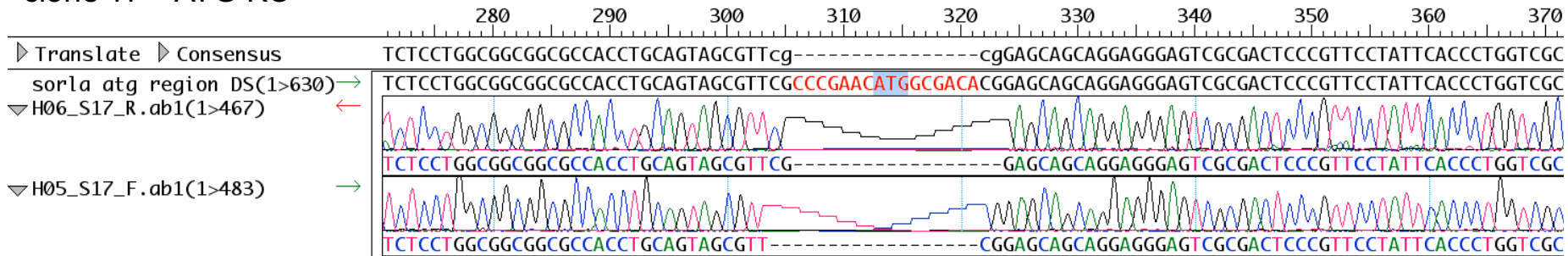
TALsorlafw: AGAAAGTGCGCGAAAGGGAC 230 bp vor ATG

TALsorlarev: TTGCAAACTGCTCACCTGTC 301 bp nach ATG

Produkt: 531 bp



clone 17 – ATG KO



clone 6 – ATG WT

