



Lexicon Genetics Incorporated – Genentech Project Materials

Genentech ID:	UNQ209	Date of Submission:	11/4/05
Lexicon Contract Name:	DNA027	Mutation Type:	X Standard Knock out
LexVision Name:	MAS221N1		☐ Conditional
Reference accessions:	ENSMUST00000027952; D86949	Is this gene X-linked?	No

Required Materials: ☐ pKOS clone DNA(s) __pKOS-56_____
☐ Target Vector DNA __pKOS-56TVNeo_____
☐ Targeted ES Cell DNA __1D2_____
☐ Genomic Map

Southern Blot Analysis: External/Internal Probe Strategies

	<u>5' External</u>	<u>3' External</u>
Name of Probe:	18/19	16/17
Restriction Enzyme for Genomic Digest:	DraI	AvrII
Predicted Wild-type Band (kb):	6.7 kb	7.7 kb
Predicted Mutant Band (kb):	5.3 kb	9.9 kb
Probe Size:	179 bp	286 bp

PCR Strategies:

For standard knockouts, give wildtype and mutant-specific strategies

For conditionals, give 5' loxP and cre-excision strategies

Wild type-specific (absent in targeted allele)		Mutation-specific product (absent in wt)	
5' Primer Name:	DNA027-f	5' Primer Name:	Neo3a
3' Primer Name:	DNA027-r	3' Primer Name:	DNA027-8
Predicted Wild-type Band (bp):	173 bp	Predicted Wild-type Band (bp):	none
Predicted mutant band (bp)	none	Predicted mutant band (bp)	352 bp

5' loxP strategy		Distinguish Cre-excised and wt	
5' Primer Name:		5' Primer Name:	
3' Primer Name:		3' Primer Name:	
Predicted Wild-type Band (bp):		Predicted Wild-type Band (bp):	
Predicted mutant band (bp)		Predicted mutant band (bp)	

Primer sequences:**Southern probes**

DNA027-16 5' – GTCGGCTTTATGACTTGAGC
DNA027-17 5' – ATCACTTTAGACTACCCACC
DNA027-18 5' – GAGAGTAAATATGACCCAGC
DNA027-19 5' – GAATGGTCCCTTTCTAGTCC

PCR Genotyping

DNA027-f 5' – TGCAGTGAAGTGCTTACACTCACC
DNA027-r 5' – GACAAGTAGTGTTCTTCTTGTTG
DNA027-8 5' – ATACAGGGTATGCATTAGTATTGA
Neo3a 5' – GCAGCGCATCGCCTTCTATC

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[illegible]

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[illegible]

Selection Cassette:

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Targeted Locus:

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