

Library Triage Cheat Sheet

Updates: 6/20/03, Gene Ontology (GO) per hjd & dph. 6/13/03, Mapping and Sequences per dbradt; Homology is correct per Imm. 6/12/03, Alleles and Phenotypes per cml; MTB per dmk; 5/23/03: Strain info. removed per mlp; Expression per cms.

Area	Always select:	Try NOT to miss:	Do NOT select:
Alleles & Phenotypes	<p>Reports & subsequent reports of heritable mutations from:</p> <ul style="list-style-type: none"> -Targeted mutations: knock outs, knock ins, conditional mutants (Flox, Cre, etc.) - Transgenes: where a gene from ANY species is expressed in mice AND results in a phenotype - Cre recombinase mice (whether or not they display a phenotype) - QTLs - Spontaneous mutations, Chemically induced, Viral inductions, Transposon induced, Radiation induced, Gene Trap 	<p>Papers that identify the genes responsible for any phenotypic mutation (i.e., mutation in shaker1 mouse ID'd as a transversion mutation in Myo7a)</p> <p><u>Review articles</u> where mouse mutant is PRIMARY focus OR a group of mutants is listed to model a particular phenotype e.g. muscular dystrophy, reproductive mutants.</p>	<p>Papers/reports:</p> <ul style="list-style-type: none"> - on the phenotype of chimeric animals that have not gone germ line. This includes aggregation chimeras - on transgenes generated for use in promoter expression studies - reviews describing gene function, pathway, system with a small paragraph or two on a relevant mutant - generation of transgenic mice for promoter analysis -on use of Scid or Rag1 deficient mice as the background strain for experiments -on use of mutant mice to evaluate drug efficacy
Expression (GXD)	-Any embryonic gene expression, including knock-in reporter expression (includes β gal and GFP)	-Papers containing blot data (i.e., RT-PCR, Northern)	-Adult only expression papers
Gene Ontology (GO)	<ul style="list-style-type: none"> -Protein studies (e.g., enzyme assays, binding studies). -Cellular immunolocalization 	<ul style="list-style-type: none"> -Enzyme assays -Gel shifts -Co-immunoprecipitations -Immunolocalizations - Anything with ~ "one gene product BINDS another gene product" in the title - A title containing a cellular compartment such as <i>cytoplasmic</i> or <i>nuclear</i> 	<ul style="list-style-type: none"> -Papers that do not analyze a mouse gene product -Papers that look at expression levels -Promoter Studies -Abnormal and disease-oriented biology.
Homology	Rat and human are primary at this time	<p>Homology for any of the following even though mouse is not mentioned:</p> <ul style="list-style-type: none"> - Cat - Cattle - Chimpanzee - Chinese hamster - Dog - Goat - Gorilla - Horse - Pig - Platypus - Rabbit - Sheep - Tammar wallaby 	<ul style="list-style-type: none"> -Homology between different markers (paralogy) -Comparison protein domains

Area	Always select:	Try NOT to miss:	Do NOT select:
Mapping	Any information providing chromosomal location/position for mouse markers incl. QTLs/phenotypes	- Data placing markers relative to each other on physical maps or by sequencing but without chromosome information - Mapping of Complex traits & Chromosome aberrations (translocations, deletions, etc.)	-----
Sequences	-Seq Ids: new gene or not new gene -Actual sequences published in the paper		Sequence or sequence ID of NON mouse species
Tumor	Endogenous mouse tumors - spontaneous - experimentally induced Key words (or parts of words of papers to keep): -carcinoma -sarcoma -adenoma -papilloma -leukemia -lymphoma neoplasia tumor (obviously) Most any thing ending in "-oma" (with a few notable exceptions [such as glaucoma])	"mouse model of" some type of tumor (or cancer) (but make sure it's not a cell line or transplanted tumor)	Transplanted tumors - mouse cell lines - human cell lines - any other transplanted tumor Key words or phrases (what NOT to pick): xenograft syngeneic transplanted tumors tumor cells injected SCID mice nude mice Do NOT pick any "tumor" with an assigned name (= cell lines): B16 melanoma; C26; neuroblastoma N2A; WEHI279; Hepa1c1c7; MCA-205; etc. Do NOT pick papers about the cytokine "Tumor Necrosis Factor" if no reference to an endogenous mouse tumor.

Commonly Encountered Cell Lines

Species	Cell Line
Mouse	3T3, 3T6 (NIH-3T3, etc.) C2C12 L, L929, L-M M1, M4, M8, M9 P19 RAG SC-1, SC-11, SV-T2
Human	293, HEK-293 HeLa IMG Jurkat, JM
Rat	F11 HTC MS NRK
Hamster	BHK CHO
Monkey (African Green)	BSC1/BSC-1 COS1, COS7, CV! (CV-1) Vero/VERO
Drosophila	DH14, DH15 KC S2, Schneider-2