

Mouse Homologue		C. elegans Homologue		D. melanogaster Homologue		S. cerevisiae Homologue		
GenBank Number	Gene Name	GenBank Number	Worm PD	GenPep Number	Gene Name	GenBank Number	Gene Name	ORF
NP_550433	Ung	NP_035807	Y56A3A.29	CAB60520			UNG1	YML021C
NP_055126	Smug1	NP_082161			CG5285	NP_650609		
NP_003916	Mbd4	NP_034904						
NP_003202	Tdg	NP_766140						
NP_058214	Ogg1	NP_035087			Ogg1	NP_572499	OGG1	YML060W
NP_036354	Mutyh	NP_573513	R10E4.5	CAA90766	CG9272	NP_610078		
NP_002519	Nth1	NP_032769	R10E4.5	CAA90766	CG9272	NP_610078	NTG1	YAL015C
NP_002425	Mpg	NP_034952						
NP_078884	Neil1	NP_082623						
NP_659480	Neil2	NP_963904						
NP_542380	Ape1	NP_033817	R09B3.1a	CAI79211	Rrp1	AAM49974	APN2	YBL019W
			T05H10.2				APN1	YKL114C
NP_055296	Apex2	NP_084219						
NP_039269	Lig3	NP_034846	C29A12.3	CAA98242	CG17227	NP_650187	CDC9	YDL164C
NP_006288	Xrcc1	NP_033558	F55A3.1	AAF39833	XRCC1	NP_572217		
NP_009185	Pnkp	NP_067524	F21D5.5	CAA91035	CG9601	NP_649792	TPP1	YMR156C
NP_001609	Parp1	NP_031441	Y71F9AL.18	AAM27195	Parp	NP_524710		
	Parp2		Y71F9AL.18	AAM27195	Parp	NP_524710		
NP_002403	Mgmt	NP_032624			agt	AAL89993	MGT1	YDL200C
NP_001001655	AU016977	NP_778181						
NP_631917	1810020C19Rik	AAH18196						
NP_001008744	Tdp1	NP_082630.1	F52C12.1	AAC68960	Tdp1	NP_523465	TDP1	YBR223C
NP_000242	Msh2	NP_032654	H26D21.2	AAC78226	spel1	NP_788058	MSH2	YOL090W
NP_002430	Msh3	NP_034959	Y47G6A.11	AAK95890	spel1	NP_788058	MSH3	YCR092C
NP_000170	Msh6	NP_034960	Y47G6A.11	AAK95890	CG7003	NP_648755	MSH6	YDR097C
NP_002431	Msh4	NP_114076	ZK1127.11	AAB93433	spel1	NP_788058	MSH4	YFL003C
NP_079535	Msh5	NP_038628	F09E8.3	CAA98059	spel1	NP_788058	MSH5	YDL154W
NP_000525	MGC36491	NP_705784	H12C20.2a	CAA98478	Pms2	AAL30078	PMS1	YNL082W
NP_000240	Mlh1	NP_081086	T28A8.7	CAB07283	Mlh1	AAL39305	MLH1	YMR167W
NP_000526	Pms2	NP_032912.1	H12C20.2a	CAA98478	Pms2	AAL30078	PMS1	YNL082W
NP_055196	Mlh3	AAH79861	T28A8.7	CAB07283	Pms2	AAL30078	MLH3	YPL164C
NP_005386	Pms2	NP_032912	H12C20.2a	CAA98478	Pms2	AAL30078	PMS1	YNL082W
BAA07473	Pms2	NP_032912	H12C20.2a	CAA98478	Pms2	AAL30078	PMS1	YNL082W
NP_036289	Fbxl2	NP_848739	C02F5.7b	AAM15540	CG9003	NP_610689	RAD7	YJR052W
NP_004619	Xpc	NP_033557	Y76B12C.2	AAF36063	mus210	NP_725451	RAD4	YER162C
NP_002865	Rad23b	NP_033037	ZK20.3	CAA93780	Rad23	NP_651918	RAD23	YEL037C

NP_004335	Cetn2	NP_062278	T21H3.3	CAA10601	CG17493	NP_652129	CDC31	YOR257W
NP_005044	Rad23a	NP_033036	ZK20.3	CAA93780	Rad23	NP_651918	RAD23	YEL037C
NP_000371	Xpa	NP_035858	K07G5.2	CAA95820	Xpac	BAA06691	RAD14	YMR201C
NP_002936	Rpa1	NP_080929	F18A1.5	AA663047	RpaA-70	NP_524274	RFA1	YAR007C
NP_002937	Rpa2	NP_035414	M04F3.1	AAK71380	CG9273	NP_610077	RFA2	YNL312W
NP_002938	Rpa3	NP_080908			CG15220	NP_573737		
NP_000113	Ercc3	NP_598419	Y66D12A.15	CAC70144	hay	NP_524020	SSL2	YIL143C
NP_000391	Ercc2	NP_031975	Y50D7A.2	AAK95892	Xpd	NP_726036	RAD3	YER171W
NP_005307	Gtf2h1	NP_032212	R02D3.3	AA894149	-	NP_725383	TFB1	YDR311W
NP_001506	Gtf2h2	NP_071294	T16H12.4	CAA83139	Ssl1	NP_649427	SSL1	YLR005W
NP_001507	D5Erttd679e	NP_852075	ZK1128.4	CAA87423	Tfb4	NP_608574	TFB4	YPR056W
NP_001508	Gtf2h4	NP_034494	Y73F8A.24	CAB70230	Tfb2	NP_648780	TFB2	YPL122C
NP_997001	D17Wsu155e	NP_852057	Y55B1AL.2	AAF59588			TFB5	YDR079C-A
NP_001790	Cdk7	NP_034004	Y39G10AL.3	AAK68887	Cdk7	NP_511044	KIN28	YDL108W
NP_001230	Ccnh	NP_075732	Y49F6B.1	AAF60728	CycH	NP_524207	CCL1	YPR025C
NP_002422	Mnat1	NP_032638	F53G2.7	AA871017	Mat1	NP_610605	TFB3	YDR460W
NP_000114	Ercc5	NP_035859	F57B10.6	AA896723	mus201	AAD50780	RAD2	YGR258C
NP_973730	Ercc1	NP_031974	F10G8.7	CAB02283	ercc1	AAL281519	RAD10	YML095C
NP_005227	Ercc4	NP_056584	C47D12.8	CAA93766	mei-9	NP_525068	RAD1	YPL022W
NP_000225	Lig1	NP_034845	C29A12.3a	CAA98242	CG5602	NP_611843	CDC9	YDL164C
NP_000073	Ercc8	NP_082318	K07A1.12	CAA19477	wds	NP_524984	RAD28	YDR030C
NP_000115	C130058G22Rik	BAC33330	F53H4.1	CAB03135	Hel89B	NP_732097	RAD26	YJR035W
NP_064581	Xab2	NP_080432	C50F2.3	AA837794	CG6197	NP_610891	SYF1	YDR416W
NP_001914	Ddb1	NP_056550	M18.5	CAA92824	DDB1	NP_650257		
NP_000098	Ddb2	NP_082395	C18E3.5	AAK68197	CG5543	NP_611832	PRP4	YPR178W
NP_005414	Tff2	NP_033389	T23H2.3a	AAM15608			RAD16	YBR114W
NP_071757	Mms19l	NP_082428	C24G6.3	AAC19216	Mms19	NP_649519	MET18	YIL128W
NP_002866	Rad51	NP_035364	Y43C5A.6a	CAB61038	spn-A	NP_524583	RAD51	YER095W
NP_598193	Rad51l1	NP_033040	Y43C5A.6a	CAB61038	spn-A	NP_524583	RAD51	YER095W
NP_478123	Rad51c	NP_444499	Y43C5A.6a	CAB61038	spn-D	AAL48784	DMC1	YER179W
NP_002869	Rad51l3	NP_035365	Y43C5A.6a	CAB61038	Rad51C	NP_610466	DMC1	YER179W
NP_008999	Dmc1h	NP_034189	Y43C5A.6a	CAB61038	spn-A	NP_524583	DMC1	YER179W
NP_005422	Xrcc2	NP_065595	Y43C5A.6a	CAB61038	spn-D	AAL48784	RAD51	YER095W
NP_005423	Xrcc3	NP_083151	Y43C5A.6a	CAB61038	spn-B	AAL48542	DMC1	YER179W
NP_002870	Rad52	NP_035366					RAD52	YML032C
NP_003570	Rad54l	NP_033041	W06D4.6	CAA22254	okr	AAL39744	RAD54	YGL163C
NP_036547	E130016E03Rik	AAH57604	W06D4.6	CAA22254	okr	AAL39744	RDH54	YBR073W
NP_009227	Brca1	NP_033894	C36A4.8	CAA91275	CG32580	NP_727928	RAD18	YCR066W
NP_000050	Brca2	NP_033895						
NP_006295	Shfdg1	NP_033195						
NP_005723	Rad50	NP_033038	T04H1.4	CAB01581	rad50	NP_726199	RAD50	YNL250W

NP_005582 NP_002476 NP_079404 NP_689676 NP_078900 NP_006256	Mre11a Nbn Mus81 Eme1 Smc611 Rad21	NP_061206 NP_038780 NP_082153 NP_808420 NP_079971 NP_033035	C29A12.4 B0041.7 C43E11.2a F56A6.4 C23H4.6 F10G7.4	CAA98243 AAC24256 AAF99975 CAB01681 AAA81127	mre11 nbs mus81 CG12936 CG5524 Rad21	NP_523547 NP_651973 NP_569873 NP_610611 NP_651228 NP_652157	MRE11 MUS81 RHC18 MCD1	YMR224C YDR386W YLR383W
NP_001460 NP_066964 NP_008835 NP_036370 NP_996820 NP_071801 NP_071932	Xrcc6 Xrcc5 Prkdc Sirt1 Lig4 Xrcc4 Dclre1c	NP_034377 NP_033559 NP_008835 NP_062786 NP_795927 NP_082288 NP_666226	Y47D3A.4 R07E5.8 B0261.2a R11A8.4 C07H6.1	CAB55094 CAA83623 AAN84885 CAA94364 AAK85439	lrbp Ku80 Tor Lig4 Snm1	NP_536773 NP_609767 NP_524891 NP_572907 NP_649548	YKU70 TOR1 SIR2 DNL4	YMR284W YJR066W YDL042C YOR005C
NP_945192 NP_001939 NP_056528	Nudt1 Dut Rrm2b	NP_032663 NP_076084 NP_955770	K07A1.2 C03C10.3	CAB03175 CAA84688	dUTPase RnrS	NP_609479 NP_525111	DUT1 RNR2	YBR252W YJL026W
NP_002681 NP_002684 NP_002682 NP_006222 NP_872590 YBR088C NP_006332 NP_057400 NP_006493 NP_009126 NP_006587 NP_057302 NP_037406 NP_037416 NP_861524	Polb Polg Pold1 Pole Pcna Rev3l Mad2l2 Rev1l Polh Poli Polq Polk Poll Polm Poln	NP_035260 NP_059490 NP_002682 NP_035262 NP_035175 NP_035394 NP_082261 NP_062516 NP_109640 NP_036102 NP_084253 NP_057302 NP_064416 NP_059097 NP_862905	Y57A10A.15 F10C2.4 F33H2.5 W03D2.4 Y37B11A.2 Y69A2AR.30 ZK675.2 F53A3.2 F53A3.2 Y55B1AL.3a F22B7.6 W03A3.2	CAB60771 CAB04077 CAB04263 AAC48257 AAK31564 AAK68576 CAA86844 AAB70988 AAB70988 AAF59587 AAA65458 AAB93325	tam DNApol-δ DNApol-ε mus209 mus205 rev7 Rev1 DNApol-η DNApol-ι mus308 DNApol-η mus308	AAL89964 NP_524099 NP_524462 AAM52709 NP_524881 NP_649555 NP_612047 NP_649371 NP_731214 NP_524333 NP_649371 NP_524333	POL4 MIP1 CDC2 POL2 POL30 REV3 MAD2 REV1 RAD30 RAD30 BRR2 POL4	YCR014C YOR330C YDL102W YNL262W YBR088C YPL167C YJL030W YOR346W YDR419W YDR419W YER172C YCR014C
NP_004102 NP_569055 NP_542432 NP_006018 NP_036576 NP_775898	Fen1 6620401K05Rik Trex2 Exo1 Spo11 A730011L01Rik	NP_032025 NP_766362 NP_036037 NP_036142 NP_036176 NP_796368	Y47G6A.8 F45G2.3 T05E11.4	AAF60653 CAB07612 CAA92974	Fen1 CG3165 tos mei-W68 C08H9.3a	NP_523765 NP_608732 AAK93218 AAC61735 CAA91145	RAD27 EXO1 SPO11	YKL113C YOR033C YHL022C
NP_003327	Ube2a	NP_062642	C35B1.1	AAC02561	UbcD6	NP_524230	RAD6	YGL058W

NP_003328 NP_064550 NP_003341 NP_003339	Ube2b Rad18 Ube2v2 Ube2n	NP_003328 NP_067360 NP_076074 NP_542127	C35B1.1 T02C1.1 F39B2.2 Y54G2A.31	AAC02561 CAA79563 CAB07383 AAK93865	UbcD6 I(3)73Ah Uev1A ben	NP_524230 NP_524933 NP_647959 NP_511150	RAD6 RAD18 MMS2 UBC13	YGL058W YCR066W YGL087C YDR092W
NP_002096 NP_005474	H2afx Chaf1a	NP_034566 NP_038761	C50F4.13 T06D10.2	CAA94747 CAB63306	CG31618 Caf1-180	NP_724343 NP_572495	HTA1	YDR225W
NP_000048 NP_000544 NP_004251 NP_000042 NP_000126 NP_001018123 NP_000127 NP_149075 NP_068741 NP_073562 NP_004620 NP_060532	Blm Wrn Recq14 Atm Fanca BC022692 Fancc Fancd2 Fance Fancf Fancg FancI	NP_031576 NP_035851 NP_478121 NP_000042 NP_058621 NP_778192 NP_032011 AAH42619 AAH16538 NP_444311 NP_080199	T04A11.6 F18C5.2 F18C5.2 Y48G1BL.2 CG12812	CAB05609 AAA68410 AAA68410 AAF60692 NP_649974	mus309 mus309 RecQ4 tefu Fancd2	NP_524319 NP_524319 NP_652607 NP_650435 NP_732560	SGS1 SGS1 SGS1 TEL1	YMR190C YMR190C YMR190C YBL088C
NP_055696 NP_073747 NP_037479 NP_778243 NP_060718 NP_002898 NP_004250 NP_598375 NP_663629	Dclre1a Dclre1b Rpa2 Aptx Neil3 Recq1 Recq15 Hel308 Rad52b	NP_061301 NP_598626 NP_035414 NP_079821 NP_666320 NP_075529 NP_569721 AAH82601 NP_079930	F39H2.5 F39H2.5 C26F1.7 Y56A3A.27 K02F3.12a E03A3.2 Y55B1AL.3a	CAD30439 CAD30439 AAB37071 CAB60518 AAK21428 CAA86232 AAF58587	Snm1 Snm1 CG9273 CG5316 Top3a mus309 RecQ5 mus301	NP_649548 NP_649548 NP_610077 NP_732421 NP_523602 NP_524319 NP_729983 NP_648178	PSO2 PSO2 RFA2 HNT3 SGS1 SGS1 HFM1	YMR137C YMR137C YNL312W YOR258W YMR190C YMR190C YGL251C
NP_001175 NP_596868 NP_004575 NP_004498 NP_579917 NP_001265 NP_001005735 NP_000537 NP_569055	Atr Rad1 Rad9 Hus1 Rad17 Chek1 Chek2 Trp53 6620401K05Rik	BAD90361 NP_035362 NP_035367 NP_032342 NP_035363 NP_001265 NP_057890 NP_035770 NP_766362	T06E4.3a Y41C4A.14 Y39A1A.23 H26D21.1 F32A11.2 Y39H10A.7a T08D2.7	CAA94790 CAB63359 CAC42372 AAC78225 CAB04224 AAF59485 CAB07420	mei-41 Rad1 Rad9 Hus1-like Rad17 grp lok p53	NP_523369 AAD31690 NP_649066 AAD31693 NP_650382 NP_723988 NP_724241 NP_651115	MEC1 RAD24 CHK1 DUN1	YBR136W YER173W YBR274W YDL101C