

CUTEst Unconstrained Problems Status

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1 Introduction

Below is compiled the status of all the unconstrained CUTEst test problems. All the functions have been sorted into categories based off whether they are correct or have various errors.

CORRECT:
DIXMAANI, BEALE, LIARWHD, SCHMVETT, SROSENBR, LUKSAN13LS, HIMMELBH, HATFLDFLS, ZANGWIL2, ERRINROS, LUKSAN14LS, MSQRTBLS, BROYDN3DLS, BROWNAL, PALMER2C, HUMPS, BARD, CURLY20, HATFLDGLS, SCURLY10, HATFLDD, JUDGE, INDEF, MGH10LS, NONMSQRT, TQUARTIC, SENSORS, MISRA1DLS, DIXMAANJ, ARWHEAD, EXTROSNB, RAT43LS, BRKMCC, SPIN2LS, SBRYBND, ARGLINC, CURLY30, CLUSTERLS, DIXMAANC, FREUROTH, DEVGLA2, CHWIRUT1LS, HELIX, WAYSEA2, DIXON3DQ, MEXHAT, PALMER8C, BROWNDEN, HILBERTA, DENSCHNB, DENSCHNA, MGH09LS, YATP2LS, ENGVAL1, LUKSAN15LS, PALMER5D, YATP2CLS, DIXMAANG, BOXBODLS, EGGCRATE, HIMMELBB, HILBERTB, BDQRTIC, ENGVAL2, MUONSINELS, DIXMAANK, DIXMAANH, DIXMAANB, QUARTC, MEYER3, RECIPELS, PRICE4, EDENSCH, EIGENALS, POWELLSG, TRIDIA, GULF, YATP1LS, SCURLY20, MISRA1BLS, CERI651ELS, GENHUMPS, OSCIPATH, DENSCHNC, FLETGBV2, DIXMAAND, DENSCHND, NONDQUAR, BROWNBS, SSI, NCB20, FLETGBV3, KSSLS, TRIGON1, S308, CHAINWOO, HATFLDE, LUKSAN11LS, SNAIL, PENALTY1, SCURLY30, CHNROSNB, KIRBY2LS, LUKSAN21LS, YATP1CLS, LUKSAN16LS, MANCINO, LANCZOS1LS, PALMER3C, SSBRYBND, EXPFIT, BOX3, ECKERLE4LS, DIXMAANP, ELATVIDU, CRAGGLVY, MGH17LS, SPARSQUR, SPMSRTLS, WOODS, PALMER1D, HIMMELBF, NONCVXUN, BRYBND, FLETCHCR, DIXMAANM, ERRINRSM, VARDIM, JENSMP, ROSZMAN1LS, CERI651DLS, BROYDNBDLS, NCB20B, FLETBV3M, GROWTHLS, DIXMAANA, SINEVAL, GAUSS2LS, FMINSURF, DIXMAANE, BENNETT5LS, CHWIRUT2LS, POWER, DANWOODLS, CURLY10, NELSONLS, PENALTY2, POWERSUM, ROSENBRTU, ARGTRIGLS, WATSON, BOXPOWER, DQRTIC, MISRA1ALS, GAUSSIAN, ALLINITU, WAYSEA1, BOX, DANIWOODLS, VESUVIOLS, RAT42LS, DQDRTIC, EG2, DIXMAANL, THURBERLS, GENROSE, PALMER4C, CERI651ALS, DEVGLA1, VIBRBEAM, EIGENBLS, TOINTGSS, SPARSINE, GAUSS3LS, HATFLDFL, VESUVIALS, GAUSS1LS, OSCIGRAD, MISRA1CLS, DENSCHNE, STREG, FLETCHBV, PENALTY3, CLIFF, STRTCHDV, DJTL, TRIGON2, LSC1LS, MODBEALE, QING, PALMER6C, LANCZOS2LS, YFITU, HAIRY, CHNRSNBM, HIMMELBCLS, DIXMAANN, POWELLSQLS, MARATOSB, LSC2LS, PALMER1C, EXP2, CERI651CLS, SSCOSINE, DIXMAANF, POWELLBSLS, LUKSAN17LS, NONCVXU2, HIMMELBG, PALMER5C, EIGENCLS, BROYDN7D, LANCZOS3LS, INDEFM, DIXMAANO, COSINE, LOGHAIRY, CERI651BLS, MOREBV, DENSCHNF, OSBORNEA, PRICE3, VESUVIOULS, BIGGS6, CUBE, KOWOSB, PALMER7C, LUKSAN12LS, ROSENBR, SPINLS, NONDIA

Match their SIF file, but do not match their SIF-Fortran CUTEst counterpart:
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CYCLOOCFLS, FBRAIN3LS, TOINTGOR, DMN37142LS, ENSOLS, SISSER, S308NE, HYDCAR6LS, DMN37143LS, INTEQNELS, COATINGNE, COOLHANSLS, HEART8LS, FMINSRF2, DMN15332LS, HAHN1LS, LUKSAN22LS, DMN15102LS, GBRAINLS, DEVGLA2NE, DIAMON2DLS, MGH10SLS, ARGLINA, DMN15333LS, COATING, MSQRTALS, ARGLINB, HYDC20LS, TOINTPSP, DMN15103LS, TOINTQOR, SQUAD, OSBORNEB, HEART6LS, SCOSINE, METHANB8LS, DIAMON3DLS
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Abnormally long SIF files:

METHANL8LS, BA-L1SPLS, MNISTS5LS, MNISTS0LS

Non-SIF Fortran code included in SIF file:
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VAREIGVL, STRATEC, BA-L49LS, VANDANMSLS, JIMACK, BA-L73LS, BA-L21LS, AKIVA, BA-L16LS, PARKCH, HIELOW, BA-L1LS, BA-L52LS, TESTQUAD
