

MEQ

Msolvr: solve equations with constants, given variables and possible start values (8s,14s)	<pre> 4: 3: {E=h*f} {P=h/h} {h*f=c} 2: {h=.000000002_m} 1: {P=3.31303448E-25} {F=1.49896229E17} {E=9.93222750198E-17} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>	<pre> 5: 4: 3: {gamma=1/sqrt(1-u^2/c^2)} {h=h0 E=h*c^2 P=h*u} 2: {u=149896229.0_m/s h0=1000.0_g} 1: {gamma=1.2 h=1.2 E=1.0E17 P=173.0t} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>
Msolvr: (13s) V->Meq: insert solutions (6s)	<pre> 8: 7: 6: 5: 4: 3: {n=n0*e^(-lambda*t)} {T=LN(2)/lambda} {A=n0*A0} 2: {n0=1000000 T=26400 t=172800} 1: {lambda=8.0E-6 n=250,000.0 A=2.0 At} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>	<pre> 8: 7: 6: 5: 4: 3: {E=h*f P=h/h h*f=c} 2: {h=.000000002_m} 1: {P=3.31303448E-25 F=1.49896229E17} {E=0.0 h=0.0 P=0.0} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>
Lconst: insert constants with units in list (1.5s) Lubval: convert to SI base and delete units	<pre> 2: {E=h*f} {P=h/h} {h*f=c} 1: {E=6.62606896E-34_(J*s)*f} {P=6.62606896E-34_(J*s)/h} {h*f=299792458._m/s} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>	<pre> 2: {E=6.62606896E-34_(J*s)*f} {P=6.62606896E-34_(J*s)/h} {h*f=299792458._m/s} 1: {E=6.62606896E-34*f} {P=6.62606896E-34/h} {h*f=299792458.} Msolvr Msolvr V-Meq Lconst Lubval Vpurge </pre>
HelpMEQ: help	<pre> Msolvr CHOOSE BOX WITH EXAMPLES Msolvr 'EQ1'...3 EQUATIONS 'RK=ak'...3 GIVEN VARS 'X1=X1s'...3 STARTVALUES '+C3' 'X1=s1'...3 SOLUTIONS Z./3. LIST MAY BE EMPTY FOR EQS WITH CONSTANTS Lconst Lubval ARE EXECUTED V-Meq 'EQ1'...3 'RK=ak'...3 'X1=s1'...3 + ...Z0=0... GRAPH </pre>	<pre> INSERT CONSTANTS, GIVEN VARS, SOLUTIONS IN EQS Vpurge + PURGES REAL AND INTEGER VARS Vset x0 + STORES x0 IN REAL OR INT VARS Lconst INSERT CONSTANTS Lubval T,U + T, BASE UNITS Lcon + C3 LIST WITH CONSTANTS FOR Lconst Leq + C3 LIST WITH EQUATIONS FOR Msolvr GRAPH </pre>