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```

DATA_SECTION

```

init_int nobs
init_vector Y(1,nobs)
init_vector x(1,nobs)

```

PARAMETER_SECTION

```

init_number a
init_number b
vector pred_Y(1,nobs)
objective_function_value f

```

PROCEDURE_SECTION

```

pred_Y=a*x+b;
f=(norm2(pred_Y-Y));
f=nobs/2.*log(f); // make it a likelihood function so that
                  // covariance matrix is correct

```

```

Initial statistics: 2 variables; iteration 0; function evaluation 0
Function value 3.6493579e+001; maximum gradient component mag -3.6127e+000
Var Value Gradient |Var Value Gradient |Var Value Gradient
1 0.00000 -3.61269e+000 | 2 0.00000 -7.27814e-001 |

- final statistics:
2 variables; iteration 7; function evaluation 19
Function value 1.4964e+001; maximum gradient component mag -7.0014e-005
Exit code = 1; converg critr 1.0000e-004
Var Value Gradient |Var Value Gradient |Var Value Gradient
1 1.90909 -7.00140e-005 | 2 4.07818 -2.08982e-005 |
Estimating row 1 out of 2 for hessian
Estimating row 2 out of 2 for hessian

```