

BUFA QEP

STATION

.001 — 999.

$$A = \begin{bmatrix} 100. & .01 \\ .01 & 1. \end{bmatrix}$$

GAUSS-ELIM

$$U = \begin{bmatrix} 100. & .01 \\ 0. & 1. \end{bmatrix}$$

↑
PROGRAM
PRINT

$$L = \begin{bmatrix} 1. & 0. \\ 0. & 1. \end{bmatrix}$$

↑
 $-.01/100.$

$$10. - .01 \times \underbrace{[.01/100.]}_0$$

CHOLESKY

$$R = \begin{bmatrix} \sqrt{100.} & .001 \\ 0. & 1. \end{bmatrix}$$

↑
 $\sqrt{1. - 0.001 \times [0.01/10]} = \sqrt{1.} = 1.$

$$LU = \begin{bmatrix} 100. & 0.1 \\ 0. & 1. \end{bmatrix}$$

$$R^*R = \begin{bmatrix} 100. & 0.1 \\ 0.1 & 1. \end{bmatrix}$$

↑
 $1.^2 + 0.001^2 =$