Ip Handbuch

Gesamtmatrix A(N, L)

$$A = \begin{pmatrix} a_{11} & a_{12} & a_{13} & \cdots & a_{1j} & \cdots & a_{1k} & a_{1l} & a_{1L} \\ a_{21} & & \vdots & \vdots & & \vdots \\ a_{31} & & \vdots & \vdots & & \vdots \\ \vdots & & & \vdots & \vdots & & \vdots \\ a_{i1} & \cdots & \cdots & \cdots & a_{ij} & & \vdots \\ \vdots & & & & \vdots & & \vdots \\ a_{m1} & \cdots & \cdots & \cdots & \cdots & a_{mk} & & & \\ \frac{a_{n1}}{a_{N1}} & & & & & & a_{nl} & & \\ & & & & & & & & & a_{nl} \end{pmatrix}$$

Datenmatrix A(n,k), Datenvektoren $a_{il}(n)$, $a_{i2}(n)$

$$A = \begin{pmatrix} a_{11} & a_{12} & a_{13} & \cdots & a_{1j} & \cdots & a_{1k} \\ a_{21} & & & \vdots & & \vdots \\ a_{31} & & & & \vdots & & \vdots \\ \vdots & & & & \vdots & & \vdots \\ a_{i1} & \cdots & \cdots & \cdots & ai_{j} & \cdots & a_{ik} \\ \vdots & & & & & \vdots & & \vdots \\ a_{m1} & & & & & a_{mj} & & a_{mk} \\ a_{n1} & & & & & & a_{nj} & \cdots & a_{nk} \end{pmatrix} \qquad a_{j_1} = \begin{pmatrix} a_{1j_1} \\ a_{2j_1} \\ a_{3j_1} \\ \vdots \\ a_{ij_1} \\ \vdots \\ a_{mj_1} \\ a_{nj_1} \end{pmatrix}, a_{j_2} = \begin{pmatrix} a_{1j_2} \\ a_{2j_2} \\ a_{3j_2} \\ \vdots \\ ai_{ij_2} \\ \vdots \\ a_{mj_2} \\ a_{nj_2} \end{pmatrix}$$

Planmatrix S(n,2), Planvektoren $a_i(n)=s_1(n)$, $a_{i>ja}(n)=s_2(n)$

$$S = egin{pmatrix} S_{11} & S_{12} \ S_{21} & S_{22} \ S_{31} & S_{32} \ dots & dots \ S_{i1} & S_{i2} \ dots & dots \ S_{m1} & S_{m2} \ S_{n1} & S_{n2} \end{pmatrix}, \quad S_{1} = egin{pmatrix} S_{11} \ S_{21} \ S_{31} \ dots \ S_{32} \ dots \ S_{32} \ dots \ S_{32} \ dots \ S_{m2} \ S_{m3} \ S_{m2} \ S_{m3} \ S_{m2} \ S_{m3} \ S_{m4} \ S_{m2} \ S_{m4} \ S_{m5} \$$

Ip Handbuch 2

Zufallsvektor n(n)

$$n = \begin{pmatrix} n_1 \\ n_2 \\ n_3 \\ \ddots \\ n_i \\ \ddots \\ n_m \\ n_n \end{pmatrix}$$

nach

$$F(n) = 10(sd^{\varsigma} - (sd^{\varsigma} - r_{sd^{\varsigma}})) - (10(sd^{\varsigma} - (sd^{\varsigma} - r_{sd^{\varsigma}})) - r_{10(sd^{\varsigma} - (sd^{\varsigma} - r_{sd^{\varsigma}}))});$$

$$sd_{i+1} = 10\left(10(sd_{i}^{\varsigma} - (sd_{i}^{\varsigma} - r_{sd_{i}^{\varsigma}})) - (10(sd_{i}^{\varsigma} - (sd_{i}^{\varsigma} - r_{sd_{i}^{\varsigma}})) - r_{10(sd_{i}^{\varsigma} - (sd_{i}^{\varsigma} - r_{sd_{i}^{\varsigma}}))})\right)$$

wobei

sd = Anfangswert (Seed)

 $r_x = \text{Rest von } x$.

 θ zur zentralen Tendenz, Lageparameter

$$AM = \overline{x} = \frac{\sum_{i=1}^{n} x_{i}}{n}, GM = \dot{x} = \sqrt[n]{\prod_{i=1}^{n} x_{i}}, HM = \overline{\overline{x}} = \frac{n}{\sum_{i=1}^{n} \frac{1}{x_{i}}}, Md = \widetilde{x}$$

 θ zur Dispersion

$$D_{\scriptscriptstyle VarO}\cong\sqrt{rac{\overline{d}}{rac{1}{25}+arsigma}}$$

Ip Handbuch 3

Grafiktransformation

$$y' = \frac{y}{\left(\frac{y_{\text{max}}}{2(y'_{\text{max}} - 1)}\right)} - \frac{y_{\text{min}}}{\left(\frac{y_{\text{max}}}{2(y'_{\text{max}} - 1)}\right)};$$

wobei

y' = transformierter y Wert

y =ursprünglicher y Wert

 $y'_{\text{max}} = \text{maximaler Skalenwert von } y'$

 $y_{\min} = \min \text{minimaler } y \text{ Wert}$

 $y_{\text{max}} = \text{maximaler } y \text{ Wert}$