Table T7

TRANSFORMATION PARAMETERS FROM ITRF89 TO INDIVIDUAL SYSTEMS AT EPOCH 1988.0 AND THE ORIENTATION RATE OF CHANGE OF SOME OF THEM (TO BE USED USING THE FORMULA BELOW)

NETWORK	T1 cm	T2 cm	T3 cm	D 10^{-8}	R1 .001" $\dot{R}1$ .001"/Y	R2 .001" $\dot{R}2$ .001"/Y	R3 .001" $\dot{R}3$ .001"/Y	
SSC(GSFC) 90 R 02	161.2	-87.0	51.9	-0.8	1.8	1.7	0.2	
	1.1	1.1	1.0	0.2	0.4	0.4	0.3	
					-0.03	0.05	-0.13	
					0.35	0.35	0.28	
SSC(NGS) 90 R 01	-0.2	-5.3	4.8	-0.3	-3.9	10.6	-0.4	
	1.1	1.2	1.1	0.2	0.5	0.4	0.4	
SSC(USNO) 90 R 01	-7.9	-17.0	5.3	-1.8	0.0	1.9	0.3	
	1.7	1.9	1.8	0.2	0.8	0.6	0.5	
SSC(SO) 88 R 01	161.2	-106.8	37.1	-0.6	-7.2	7.5	-1.6	
	6.7	3.7	5.1	0.4	1.8	2.8	1.2	
SSC(NAOMZ)89 R 01	-7.8	11.8	-5.4	1.2	-3.9	8.0	-1.5	
	7.5	7.3	6.2	0.9	2.7	2.8	2.0	
SSC(JPL) 90 R 02	-1.7	-3.8	6.9	-3.6	2.2	1.8	-0.1	
	2.4	2.4	2.4	0.4	1.1	1.0	1.1	
SSC(CSR) 89 L 02	0.0	0.0	0.0	0.0	-3.4	4.3	-15.9	
	-	-	-	-	-	-	-	(*)
					0.23	0.52	-0.70	
					-	-	-	
SSC(GSFC) 89 L 01	-1.0	-1.0	2.4	0.0	-1.0	5.3	-7.7	
	0.9	0.9	0.9	0.1	0.4	0.4	0.3	
SSC(DGFII)89 L 03	0.0	-1.0	4.4	-0.2	-286.3	-46.0	3.4	
	1.4	1.4	1.3	0.2	0.6	0.6	0.4	
					-0.25	0.15	-0.45	
					0.46	0.46	0.35	

SSC(DUT) 90 L 01	-0.5	-2.3	-6.1	-1.1	0.0	1.7	-4.4
	1.2	1.2	1.2	0.2	0.5	0.5	0.4
					0.08	0.68	-0.53
					0.35	0.35	0.28
SSC(ZIPE) 90 L 01	-3.1	0.4	-8.6	0.1	0.3	1.0	0.7
	1.2	1.2	1.1	0.2	0.5	0.5	0.4
SSC(SO) 90 L 01	-0.6	-0.7	1.7	-0.8	-3.5	5.0	-14.2
	1.2	1.1	1.1	0.2	0.5	0.5	0.4
SSC(GAOUA)90 L 01	-3.3	-1.8	-1.7	-1.2	0.8	3.2	-0.8
	1.2	1.2	1.1	0.2	0.5	0.5	0.4
SSC(LPAC) 90 L 01	1.5	-0.9	8.9	-0.2	2.3	-0.7	-4.7
	1.6	1.5	1.4	0.2	0.6	0.6	0.5
SSC(UTXMO)90 M 01	-2.6	-2.0	34.2	-4.3	-0.9	0.3	-3.1
	5.9	7.6	5.4	0.9	2.4	1.7	3.3
SSC(JPL) 90 M 01	-10.0	-2.8	0.2	-2.0	1.4	3.3	-1.4
	4.5	5.0	4.7	0.6	2.3	1.7	1.3
SSC(CERGA)89 M 01	-13.4	2.6	-4.8	-5.3	0.5	3.6	-11.5
	4.5	5.3	4.8	0.6	2.5	1.7	1.3
SSC(SO) 86 M 01	-17.4	20.8	6.7	-1.9	15.9	7.0	-6.2
	9.1	10.5	9.5	1.2	5.0	3.5	2.6

$$\begin{vmatrix} XS \\ YS \\ ZS \end{vmatrix} = \begin{vmatrix} X \\ Y \\ Z \end{vmatrix} + \begin{vmatrix} T1 \\ T2 \\ T3 \end{vmatrix} + \begin{vmatrix} D & -R3 & R2 \\ R3 & D & -R1 \\ -R2 & R1 & D \end{vmatrix} \begin{vmatrix} X \\ Y \\ Z \end{vmatrix}$$

Where X,Y,Z are the coordinate in the ITRF89 system, and XS,YS,ZS are the coordinates in the individual system.

$$Ri(T) = Ri(1988.0) + \dot{R}i(T - 1988.0)$$

where T is the epoch in year. When $\dot{R}i$ is not given, one can assume $\dot{R}i = 0$.

(*) $\dot{R}i$ for SSC(CSR) 89 L 02 are fixed to the value given by Minster and Jordan as difference between AM1-2 and AM0-2.