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LITHOGEOCHEMICAL AND ND-SR ISOTOPE DATA OF THE ORTHOGRANULITES OF THE JUIZ DE FORA COMPLEX, SE-BRAZIL: INSIGHTS FROM A HIDDEN RHYACIAN OROGEN WITHIN THE RIBEIRA BELT

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Sample	Rock type	Material	Magmatic Series	Methods	Crystallization	Metamorphism	TDM (Nd)	εNd	εHf	TDM (Hf)	Rb-Sr age	K-Ar age	Region	Reference
1225/101	Gneiss	Py	-	A	-	-	-	-	-	-	-	1220 ± 350 Ma	Juiz de Fora - Carangola (MG)	[1]
1333/101	Gneiss	Py	-	A	-	-	-	-	-	-	-	1260 ± 130 Ma	Juiz de Fora - Carangola (MG)	[1]
144a	Gneiss	bt	-	A	-	-	-	-	-	-	-	494 ± 25 Ma	Juiz de Fora - Carangola (MG)	[2]
144b	Gneiss	amp	-	A	-	-	-	-	-	-	-	570 ± 18 Ma	Juiz de Fora - Carangola (MG)	[2]
124	Gneiss	bt	-	A	-	-	-	-	-	-	-	593 ± 30 Ma	Juiz de Fora - Carangola (MG)	[2]
VI-176A	Granulite	bt	-	A	-	-	-	-	-	-	-	492 ± 10 Ma	Juiz de Fora - Carangola (MG)	[2]
1206/120	Mafic rock	amp	-	A	-	-	-	-	-	-	-	788 ± 38 Ma	Juiz de Fora - Carangola (MG)	[1]
1343/120	Mafic rock	amp	-	A	-	-	-	-	-	-	-	782 ± 39 Ma	Juiz de Fora - Carangola (MG)	[1]
1335/120	Mafic rock	bt	-	A	-	-	-	-	-	-	-	462 ± 23 Ma	Juiz de Fora - Carangola (MG)	[1]
1207/120	Mafic rock	plg	-	A	-	-	-	-	-	-	-	1570 ± 80 Ma	Juiz de Fora - Carangola (MG)	[1]
1336/120	Mafic rock	plg	-	A	-	-	-	-	-	-	-	1500 ± 75 Ma	Juiz de Fora - Carangola (MG)	[1]

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109b	Gneiss	amp	-	A	-	-	-	-	-	-	-	615 ± 31 Ma	Juiz de Fora - Carangola (MG)	[2]
108	Granitoid gneiss	bt	-	A	-	-	-	-	-	-	-	453 ± 23 Ma	Juiz de Fora - Carangola (MG)	[1]
121a,b	Granulite-leptinite	zr	-	D	2200 Ma	600 Ma	-	-	-	-	-	-	Carangola (MG)	[1]
127	Charnockite	WR, plg+qtz, kf	-	B	-	-	-	-	-	-	496 Ma	-	Juiz de Fora (MG)	[2]
121	Granulite	WR, plg+qtz, kf, bt		B	-	-	-	-	-	-	600 Ma	-	Carangola (MG)	[1]
JD-145 and 127RT	Charnokites	WR	-	C	-	-	-	-	-	-	2650 Ma	-	Juiz de Fora (MG)	[2]
121A.121B. 128 and 130	Granulite, leptinite, garnet gneiss and charnockite	WR	-	C	-	-	-	-	-	-	2250 Ma	-	Juiz de Fora - Carangola (MG)	[1][2]
5B-1	Charnockitic granulite	zr	calcalkaline	D	2134 ± 5 Ma	579 Ma	-	-	-	-	-	-	Conservatória (RJ)	[3]
D-45	enderbitic gneiss	WR	-	D	-	-	2.9 Ga	-6	-	-	-	-	Abre Campo-Manhuaçu (MG)	[4]
D-49	enderbitic gneiss	WR	-	D	-	-	3.2 Ga	-9.9	-	-	-	-	Abre Campo-Manhuaçu (MG)	[4]
D-244	enderbitic gneiss	WR	-	D	-	-	2 Ga	2.7	-	-	-	-	Abre Campo-Manhuaçu (MG)	[4]
D-245	enderbitic gneiss	WR	-	D	-	-	2.2 Ga	0.9	-	-	-	-	Abre Campo-Manhuaçu (MG)	[4]
LC-17	enderbitic granulite	zr	Calcalkaline	E	2985±17 Ma	2856±44 Ma	-	-	-	-	-	-	Juiz de Fora (MG)	[5]

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UB-1	enderbitic gneiss	zr,WR	Calcalkaline	E	2084±13 Ma	594±37 Ma	2.6 Ga	-3.5	-	-	-	-	Ubá (MG)	[6]
LC-66A	Noritic granulite	zr,WR	Calcalkaline	E	2113±20 Ma	584±57 Ma	2.3 Ga	-0.4	-	-	-	-	Ponte Nova (MG)	[6]
TR-JEF-01-C1	Granodioritic orthogneiss	WR	Calcalkaline MK	D	-	-	2.37 Ga	-0.63	-	-	-	-	Três Rios (RJ)	[7]
TR-JEF-01A	Mafic granulite	zr, WR	Tloleiitic	D	615±6 Ma	589±5 Ma	-	7.7	-	-	-	-	Três Rios (RJ)	[7]
1070	mafic granulite	zr	Tholeiitic (MORB)	D	2427±9 Ma	654±12 Ma	-		-	-	-	-	Itaperuna (MG)	[8]
1076	enderbitic granulite	zr	calcalkaline MK	D	1966±38 Ma	587±15 Ma	-	-	-	-	-	-	Itaperuna (MG)	[8]
CJE-44	mafic granulite	zr, WR	Akaline	D	1765±34 Ma	586±14 Ma	2143 Ma	1.56	-	-	-	-	Conservatória (RJ)	[8][9]
1062	charno-enderbitic Granulite	zr	Calcalkaline	D	1656±69 Ma	590±5 Ma	-	-	-	-	-	-	Juiz de Fora (MG)	[8]
247	Enderbite	zr	-	F	2116 ± 13 Ma	-	-	-	-	-	-	-	Alvarenga (MG)	[10]
IV-48	granodioritic orthogneiss	zr	-	F	2107 ± 71	580 ± 19	-	-	-	-	-	-	Governador Valadares (MG)	[11]
M-03	tonalitic orthogneiss	zr, WR	-	F	2110 ± 12	-	2.18 Ga	+2.2	+2.3 to −5.1	2.69–2.30 Ga	-	-	Governador Valadares (MG)	[11]
LC-07	tonalitic orthogneiss	zr, WR	-	E	2122 ± 11	565 ± 7	2.03 Ga	+4.5	-	-	-	-	Governador Valadares (MG)	[11]
RC-101	enderbitic orthogneiss	zr	-	F	2144 ± 13	-	-	-	+8.2 to −2.5	2.59–2.11 Ga	-	-	Ipanema (MG)	[11]
RC-103	enderbitic orthogneiss	zr	-	F	2143 ± 21	-	-	-	-	-	-	-	Ipanema (MG)	[11]

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LC-32	charnockitic orthogneiss	zr	-	F	2195 ± 15	587 ± 9	-	-	-	-	-	-	Ipanema (MG)	[11]
RB-07A	mafic orthogneiss	zr	Tholeiitic	F	2379 ± 24 and 2080 ± 48 to 1969 ± 53 Ma	617 ± 26 to 524 ± 15 Ma	-	-	-28.52 to -5.14	3.45 to 1.97 Ga	-	-	São Pedro do Avaí (MG)	[12]
RB10A	enderbitic orthogneiss	zr	Calc-alkaline	F	-	619 ± 13 to 589 ± 12 Ma	-	-	-19.88 to -17.97	2.80-2.68 Ma	-	-	Santa Margarida (MG)	[12]
RB13A	charnockitic orthogneiss	zr	Calc-Alkaline	F	2051 ± 30 Ma	559 ± 12 Ma	-	-	6.47 to 3.94	2.7-2.26 Ga	-	-	São João de Manhuaçu (MG)	[12]

* Material: WR- Whole Rock; zr- zircon; py- pyroxene; plg- plagioclase; qtz- quartz; bt- biotite; amp- amphibole; kf- k-felspar. Methods: A- Radiometric K-Ar; B- Rb-Sr Mineral isochron; C- Rb-Sr Reference isochron; D- U-Pb and/or Sm-Nd ID-TIMS; E- U-Pb SHRIMP; F- LA-ICP-MS; References: [1]- Delhal et al. (1969); [2]- Cordani et al. (1973); [3]- Machado et al. (1996) [4]- Fischel et al. (1998); [5]- Silva et al. (2002); [6]- Noce et al. (2007); [7]- André et al. (2009); [8]- Heilbron et al. (2010); [9]- Ragatky et al. (1999); [10]- Gonçalves et al. (2014); [11]- Degler et al. (2018); [12]- Kuribara et al. (2019).