Karen Fischer

List of Publications by Year
in descending order

53 papers	3,766 citations	147801 31 h-index	175258 52 g-index
57 all docs	57 docs citations	57 times ranked	2148 citing authors

#	Article	IF	Citations
1	New Insights Into Lithospheric Structure and Melting Beneath the Colorado Plateau. Geochemistry, Geophysics, Geosystems, 2022, 23, .	2.5	3
2	Assessing the presence of volatile-bearing mineral phases in the cratonic mantle as a possible cause of mid-lithospheric discontinuities. Earth and Planetary Science Letters, 2021, 553, 116602.	4.4	24
3	Hotspot signatures at the North American passive margin. Geology, 2021, 49, 525-530.	4.4	9
4	Multiâ€Layer Seismic Anisotropy Beneath Greenland. Geochemistry, Geophysics, Geosystems, 2021, 22, e2020GC009512.	2.5	2
5	Global Patterns in Cratonic Midâ€Lithospheric Discontinuities From Sp Receiver Functions. Geochemistry, Geophysics, Geosystems, 2021, 22, e2021GC009819.	2.5	19
6	Imaging with pre-stack migration based on Sp scattering kernels. Geophysical Journal International, 2020, 220, 428-449.	2.4	10
7	New Approaches to Multifrequency <i>Sp</i> Stacking Tested in the Anatolian Region. Journal of Geophysical Research: Solid Earth, 2020, 125, e2020JB020313.	3.4	8
8	A comparison of oceanic and continental mantle lithosphere. Physics of the Earth and Planetary Interiors, 2020, 309, 106600.	1.9	20
9	An adaptive Bayesian inversion for upper-mantle structure using surface waves and scattered body waves. Geophysical Journal International, 2018, 214, 232-253.	2.4	24
10	The spatial sensitivity of Sp converted wavesâ€"scattered-wave kernels and their applications to receiver-function migration and inversion. Geophysical Journal International, 2018, 212, 1722-1735.	2.4	8
11	The lithosphereâ€"asthenosphere boundary beneath the South Island of New Zealand. Earth and Planetary Science Letters, 2018, 484, 92-102.	4.4	11
12	The relative roles of inheritance and long-term passive margin lithospheric evolution on the modern structure and tectonic activity in the southeastern United States. , 2018, 14, 1385-1410.		35
13	The Changing Face of the Lithosphereâ€Asthenosphere Boundary: Imaging Continental Scale Patterns in Upper Mantle Structure Across the Contiguous U.S. With Sp Converted Waves. Geochemistry, Geophysics, Geosystems, 2018, 19, 2593-2614.	2.5	44
14	A Visual Survey of Global Slab Geometries With ShowEarthModel and Implications for a Threeâ€Dimensional Subduction Paradigm. Earth and Space Science, 2018, 5, 240-257.	2.6	38
15	How Sharp Is the Cratonic Lithosphereâ€Asthenosphere Transition?. Geophysical Research Letters, 2017, 44, 10,189.	4.0	23
16	Interpreting spatially stacked Sp receiver functions. Geophysical Journal International, 2017, 210, 874-886.	2.4	36
17	The zone of influence of the subducting slab in the asthenospheric mantle. Journal of Geophysical Research: Solid Earth, 2017, 122, 6599-6624.	3.4	13
18	Reconstructing the end of the Appalachian orogeny. Geology, 2017, 45, 15-18.	4.4	45

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19	Imaging crustal structure beneath the southern Appalachians with wavefield migration. Geophysical Research Letters, 2016, 43, 12,054.	4.0	13
20	Relationship between observed upper mantle structures and recent tectonic activity across the Southeastern United States. Journal of Geophysical Research: Solid Earth, 2016, 121, 3393-3414.	3.4	64
21	The meaning of midlithospheric discontinuities: A case study in the northern U.S. craton. Geochemistry, Geophysics, Geosystems, 2015, 16, 4057-4083.	2.5	60
22	Shallow mantle velocities beneath the southern Appalachians from <i>Pn</i> phases. Geophysical Research Letters, 2015, 42, 339-345.	4.0	11
23	Constraining lithologic variability along the Alleghanian detachment in the southern Appalachians using passive-source seismology. Geology, 2015, 43, 431-434.	4.4	15
24	The impact of slab dip variations, gaps and rollback on mantle wedge flow: insights from fluids experiments. Geophysical Journal International, 2014, 197, 705-730.	2.4	26
25	Localized shear in the deep lithosphere beneath the San Andreas fault system. Geology, 2014, 42, 295-298.	4.4	36
26	Shear wave splitting and shear wave splitting tomography of the southern Puna plateau. Geophysical Journal International, 2014, 199, 688-699.	2.4	10
27	The lithosphereâ€“asthenosphere boundary and the tectonic and magmatic history of the northwestern United States. Earth and Planetary Science Letters, 2014, 402, 69-81.	4.4	77
28	Contrasting lithospheric signatures across the western United States revealed by Sp receiver functions. Earth and Planetary Science Letters, 2014, 402, 90-98.	4.4	76
29	Reconciling mantle attenuation-temperature relationships from seismology, petrology, and laboratory measurements. Geochemistry, Geophysics, Geosystems, 2014, 15, 3521-3542.	2.5	71
30	Crustal evolution across the southern Appalachians: Initial results from the SESAME broadband array. Geophysical Research Letters, 2013, 40, 3853-3857.	4.0	34
31	Seismic anisotropy above and below the subducting Nazca lithosphere in southern South America. Journal of Geophysical Research, 2012, 117, .	3.3	22
32	Lithospheric Thinning Beneath Rifted Regions of Southern California. Science, 2011, 334, 783-787.	12.6	107
33	3-D shear wave radially and azimuthally anisotropic velocity model of the North American upper mantle. Geophysical Journal International, 2011, 184, 1237-1260.	2.4	136
34	The Lithosphere-Asthenosphere Boundary. Annual Review of Earth and Planetary Sciences, 2010, 38, 551-575.	11.0	349
35	Constraints on upper mantle anisotropy surrounding the Cocos slab from <i>SK</i>(<i>K</i>)<i>S</i> splitting. Journal of Geophysical Research, 2010, 115, .	3.3	39
36	North American lithospheric discontinuity structure imaged by <i>Ps</i> and <i>Sp</i> receiver functions. Journal of Geophysical Research, 2010, 115, .	3.3	233

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37	A mechanism for lowâ€extent melts at the lithosphereâ€asthenosphere boundary. Geochemistry, Geophysics, Geosystems, 2010, 11, .	2.5	52
38	The lithosphereâ€“asthenosphere boundary and cratonic lithospheric layering beneath Australia from Sp wave imaging. Earth and Planetary Science Letters, 2010, 300, 299-310.	4.4	158
39	Shear wave anisotropy beneath Nicaragua and Costa Rica: Implications for flow in the mantle wedge. Geochemistry, Geophysics, Geosystems, 2009, 10, .	2.5	52
40	Crustal structure beneath the Floridaâ€toâ€Edmonton broadband seismometer array. Geophysical Research Letters, 2009, 36, .	4.0	31
41	Arc-parallel flow in the mantle wedge beneath Costa Rica and Nicaragua. Nature, 2008, 451, 1094-1097.	27.8	201
42	Resolving three-dimensional anisotropic structure with shear wave splitting tomography. Geophysical Journal International, 2008, 173, 859-886.	2.4	65
43	<i>P</i>â€toâ€<i>S</i> and <i>S</i>â€toâ€<i>P</i> imaging of a sharp lithosphereâ€asthenosphere boundary beneath eastern North America. Journal of Geophysical Research, 2007, 112, .	3.3	151
44	Multichannel inversion of scattered teleseismic body waves: Practical considerations and applicability. Geophysical Monograph Series, 2005, , 187-203.	0.1	33
45	Shear velocity structure and azimuthal anisotropy beneath eastern North America from Rayleigh wave inversion. Journal of Geophysical Research, 2003, 108, .	3.3	125
46	Waning buoyancy in the crustal roots of old mountains. Nature, 2002, 417, 933-936.	27.8	109
47	A Complex Pattern of Mantle Flow in the Lau Backarc. Science, 2001, 292, 713-716.	12.6	248
48	The influence of plate motions on three-dimensional back arc mantle flow and shear wave splitting. Journal of Geophysical Research, 2000, 105, 28009-28033.	3.3	146
49	Shear wave splitting, continental keels, and patterns of mantle flow. Journal of Geophysical Research, 2000, 105, 6255-6275.	3.3	219
50	Modeling anisotropy and plate-driven flow in the Tonga subduction zone back arc. Journal of Geophysical Research, 2000, 105, 16181-16191.	3.3	92
51	Anisotropy and Flow in Pacific Subduction Zone Back-arcs. Pure and Applied Geophysics, 1998, 151, 463-475.	1.9	70
52	Mantle anisotropy beneath northwest Pacific subduction zones. Journal of Geophysical Research, 1996, 101, 15987-16002.	3.3	175
53	Seismic anisotropy beneath the Shumagin Islands segment of the Aleutian-Alaska subduction zone. Journal of Geophysical Research, 1995, 100, 18165-18177.	3.3	88