S J Bolton

List of Publications by Year in descending order

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256 papers 9,508 citations

50276 46 h-index 84 g-index

277 all docs

277 docs citations

times ranked

277

3600 citing authors

| # | Article | IF | CITATIONS |
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| 1 | Cassini Plasma Spectrometer Investigation. Space Science Reviews, 2004, 114, 1-112. | 8.1 | 452 |
| 2 | Cassini finds molecular hydrogen in the Enceladus plume: Evidence for hydrothermal processes. Science, 2017, 356, 155-159. | 12.6 | 396 |
| 3 | Composition and Dynamics of Plasma in Saturn's Magnetosphere. Science, 2005, 307, 1262-1266. | 12.6 | 281 |
| 4 | Comparing Jupiter interior structure models to <i>Juno</i> gravity measurements and the role of a dilute core. Geophysical Research Letters, 2017, 44, 4649-4659. | 4.0 | 265 |
| 5 | A New Model of Jupiter's Magnetic Field From Juno's First Nine Orbits. Geophysical Research Letters, 2018, 45, 2590-2596. | 4.0 | 258 |
| 6 | Jupiter's interior and deep atmosphere: The initial pole-to-pole passes with the Juno spacecraft. Science, 2017, 356, 821-825. | 12.6 | 229 |
| 7 | The Juno Mission. Space Science Reviews, 2017, 213, 5-37. | 8.1 | 222 |
| 8 | Jupiter's atmospheric jet streams extend thousands of kilometres deep. Nature, 2018, 555, 223-226. | 27.8 | 189 |
| 9 | Plasma Observations at lo with the Galileo Spacecraft. Science, 1996, 274, 394-395. | 12.6 | 184 |
| 10 | Measurement of Jupiter's asymmetric gravity field. Nature, 2018, 555, 220-222. | 27.8 | 177 |
| 11 | Control of Jupiter's radio emission and aurorae by the solar wind. Nature, 2002, 415, 985-987. | 27.8 | 171 |
| 12 | Dynamics of Saturn's Magnetosphere from MIMI During Cassini's Orbital Insertion. Science, 2005, 307, 1270-1273. | 12.6 | 166 |
| 13 | A suppression of differential rotation in Jupiter's deep interior. Nature, 2018, 555, 227-230. | 27.8 | 165 |
| 14 | Magnetospheric Science Objectives of the Juno Mission. Space Science Reviews, 2017, 213, 219-287. | 8.1 | 163 |
| 15 | Evidence for a magnetosphere at Ganymede from plasma-wave observations by the Galileo spacecraft. Nature, 1996, 384, 535-537. | 27.8 | 152 |
| 16 | Galileo Plasma Wave Observations in the Io Plasma Torus and Near Io. Science, 1996, 274, 391-392. | 12.6 | 131 |
| 17 | Galileo evidence for rapid interchange transport in the Io torus. Geophysical Research Letters, 1997, 24, 2131-2134. | 4.0 | 109 |
| 18 | Ultra-relativistic electrons in Jupiter's radiation belts. Nature, 2002, 415, 987-991. | 27.8 | 109 |

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| 19 | Jupiter's magnetosphere and aurorae observed by the Juno spacecraft during its first polar orbits. Science, 2017, 356, 826-832. | 12.6 | 109 |
| 20 | The distribution of ammonia on Jupiter from a preliminary inversion of Juno microwave radiometer data. Geophysical Research Letters, 2017, 44, 5317-5325. | 4.0 | 108 |
| 21 | The water abundance in Jupiter's equatorial zone. Nature Astronomy, 2020, 4, 609-616. | 10.1 | 96 |
| 22 | Juno observations of energetic charged particles over Jupiter's polar regions: Analysis of monodirectional and bidirectional electron beams. Geophysical Research Letters, 2017, 44, 4410-4418. | 4.0 | 90 |
| 23 | Clusters of cyclones encircling Jupiter's poles. Nature, 2018, 555, 216-219. | 27.8 | 90 |
| 24 | Electron sources in Saturn's magnetosphere. Journal of Geophysical Research, 2007, 112, n/a-n/a. | 3.3 | 83 |
| 25 | Preliminary interpretation of Titan plasma interaction as observed by the Cassini Plasma Spectrometer: Comparisons with Voyager 1. Geophysical Research Letters, 2006, 33, . | 4.0 | 82 |
| 26 | Initial interpretation of Titan plasma interaction as observed by the Cassini plasma spectrometer: Comparisons with Voyager 1. Planetary and Space Science, 2006, 54, 1211-1224. | 1.7 | 82 |
| 27 | Discrete and broadband electron acceleration in Jupiter's powerful aurora. Nature, 2017, 549, 66-69. | 27.8 | 79 |
| 28 | Jupiter's Gravity Field Halfway Through the Juno Mission. Geophysical Research Letters, 2020, 47, e2019GL086572. | 4.0 | 79 |
| 29 | Jupiter gravity field estimated from the first two Juno orbits. Geophysical Research Letters, 2017, 44, 4694-4700. | 4.0 | 74 |
| 30 | Lightning and Plasma Wave Observations from the Galileo Flyby of Venus. Science, 1991, 253, 1522-1525. | 12.6 | 71 |
| 31 | Response of Jupiter's auroras to conditions in the interplanetary medium as measured by the Hubble Space Telescope and Juno. Geophysical Research Letters, 2017, 44, 7643-7652. | 4.0 | 68 |
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| 34 | A complex dynamo inferred from the hemispheric dichotomy of Jupiter's magnetic field. Nature, 2018, 561, 76-78. | 27.8 | 64 |
| 35 | Electron beams and loss cones in the auroral regions of Jupiter. Geophysical Research Letters, 2017, 44, 7131-7139. | 4.0 | 61 |
| 36 | A New Model of Jupiter's Magnetic Field at the Completion of Juno's Prime Mission. Journal of Geophysical Research E: Planets, 2022, 127, . | 3.6 | 60 |

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| 37 | Correlation studies between solar wind parameters and the decimetric radio emission from Jupiter. Journal of Geophysical Research, 1989, 94, 121-128. | 3.3 | 59 |
| 38 | Outflow of hydrogen ions from Ganymede. Geophysical Research Letters, 1997, 24, 2151-2154. | 4.0 | 57 |
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| 43 | Microwave remote sensing of Jupiter's atmosphere from an orbiting spacecraft. Icarus, 2005, 173, 447-453. | 2.5 | 52 |
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| 45 | Prevalent lightning sferics at 600 megahertz near Jupiter's poles. Nature, 2018, 558, 87-90. | 27.8 | 52 |
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| 47 | In Situ Observations Connected to the Io Footprint Tail Aurora. Journal of Geophysical Research E: Planets, 2018, 123, 3061-3077. | 3.6 | 48 |
| 48 | Magnetospheric and Plasma Science with Cassini-Huygens. Space Science Reviews, 2002, 104, 253-346. | 8.1 | 47 |
| 49 | Energetic Particles and Acceleration Regions Over Jupiter's Polar Cap and Main Aurora: A Broad Overview. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027699. | 2.4 | 47 |
| 50 | Time variation of Jupiter's internal magnetic field consistent with zonal wind advection. Nature Astronomy, 2019, 3, 730-735. | 10.1 | 46 |
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| 62 | Generation of the Jovian hectometric radiation: First lessons from Juno. Geophysical Research Letters, 2017, 44, 4439-4446. | 4.0 | 38 |
| 63 | The global plasma environment of Titan as observed by Cassini Plasma Spectrometer during the first two close encounters with Titan. Geophysical Research Letters, 2005, 32, . | 4.0 | 37 |
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| 72 | Low-energy electron measurements at Ganymede with the Galileo spacecraft: Probes of the magnetic topology. Geophysical Research Letters, 1997, 24, 2159-2162. | 4.0 | 33 |

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| 129 | The Rich Dynamics of Jupiter's Great Red Spot from JunoCam: Juno Images. Astronomical Journal, 2018, 156, 162. | 4.7 | 19 |
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| 131 | Junoâ€UVS Observation of the Io Footprint During Solar Eclipse. Journal of Geophysical Research: Space Physics, 2019, 124, 5184-5199. | 2.4 | 19 |
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