# Nicholas A Achilleos

List of Publications by Year
in descending order



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|---|---|---|---|
| 116 papers | 4,614 citations | 76326 40 h-index | 110387 64 g-index |
| 127 all docs | 127 docs citations | 127 times ranked | 2180 citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Dawnâ€Dusk Asymmetry in Energetic (>20ÂkeV) Particles Adjacent to Saturn's Magnetopause. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028264. | 2.4 | 1 |
| 2 | Constraining the Temporal Variability of Neutral Winds in Saturn's Lowâ€Latitude Ionosphere Using Magnetic Field Measurements. Journal of Geophysical Research E: Planets, 2021, 126, e2020JE006578. | 3.6 | 4 |
| 3 | The Cushion Region and Dayside Magnetodisc Structure at Saturn. Geophysical Research Letters, 2021, 48, e2020GL091796. | 4.0 | 2 |
| 4 | A test of the planetâ€“star unipolar inductor for magnetic white dwarfs. Monthly Notices of the Royal Astronomical Society, 2021, 503, 3743-3758. | 4.4 | 9 |
| 5 | Electron Bulk Heating at Saturn's Magnetopause. Journal of Geophysical Research: Space Physics, 2021, 126, e2020JA028800. | 2.4 | 1 |
| 6 | A Rotating Azimuthally Distributed Auroral Current System on Saturn Revealed by the Cassini Spacecraft. Astrophysical Journal Letters, 2021, 919, L25. | 8.3 | 3 |
| 7 | Magnetosphereâ€Ionosphereâ€Thermosphere Coupling at Jupiter Using a Threeâ€Dimensional Atmospheric General Circulation Model. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA026792. | 2.4 | 9 |
| 8 | Jupiter's Xâ€ray Emission During the 2007 Solar Minimum. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027219. | 2.4 | 17 |
| 9 | Seasonal Dependence of the Magnetospheric Drag Torque on Saturn's Northern and Southern Polar Thermospheres and its Relation to the Periods of Planetary Period Oscillations. Journal of Geophysical Research: Space Physics, 2020, 125, e2020JA028247. | 2.4 | 1 |
| 10 | Trapped Particle Motion in Magnetodisk Fields. Journal of Geophysical Research: Space Physics, 2020, 125, e2020JA027827. | 2.4 | 4 |
| 11 | Magnetopause Compressibility at Saturn with Internal Drivers. Geophysical Research Letters, 2020, 47, e2019GL086438. | 4.0 | 3 |
| 12 | Tracking Counterpart Signatures in Saturn's Auroras and ENA Imagery During Largeâ€Scale Plasma Injection Events. Journal of Geophysical Research: Space Physics, 2020, 125, e2019JA027542. | 2.4 | 6 |
| 13 | A Selfâ€Regulating Equilibrium Magnetopause Model With Applications to Saturn. Journal of Geophysical Research: Space Physics, 2019, 124, 6833-6849. | 2.4 | 2 |
| 14 | Local Time Variation in the Largeâ€Scale Structure of Saturn's Magnetosphere. Journal of Geophysical Research: Space Physics, 2019, 124, 7425-7441. | 2.4 | 6 |
| 15 | A magnetodisc model service for planetary space weather studies. Journal of Space Weather and Space Climate, 2019, 9, A24. | 3.3 | 1 |
| 16 | Magnetism, X-rays and accretion rates in WDâ€‰1145+017 and other polluted white dwarf systems. Monthly Notices of the Royal Astronomical Society, 2018, 474, 947-960. | 4.4 | 51 |
| 17 | VESPA: A community-driven Virtual Observatory in Planetary Science. Planetary and Space Science, 2018, 150, 65-85. | 1.7 | 28 |
| 18 | Virtual Planetary Space Weather Services offered by the Europlanet H2020 Research Infrastructure. Planetary and Space Science, 2018, 150, 50-59. | 1.7 | 13 |

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| 19 | The Periodic Flapping and Breathing of Saturn's Magnetodisk During Equinox. Journal of Geophysical Research: Space Physics, 2018, 123, 8292-8316. | 2.4 | 5 |
| 20 | An Initial Study Into the Longâ€Term Influence of Solar Wind Dynamic Pressure on Jupiter's Thermosphere. Journal of Geophysical Research: Space Physics, 2018, 123, 9357-9369. | 2.4 | 5 |
| 21 | Mapping Saturn's Nightside Plasma Sheet Using Cassini's Proximal Orbits. Geophysical Research Letters, 2018, 45, 6798-6804. | 4.0 | 4 |
| 22 | The aurorae of Uranus past equinox. Journal of Geophysical Research: Space Physics, 2017, 122, 3997-4008. | 2.4 | 24 |
| 23 | Modeling the compressibility of Saturn's magnetosphere in response to internal and external influences. Journal of Geophysical Research: Space Physics, 2017, 122, 1572-1589. | 2.4 | 13 |
| 24 | Largeâ€scale solar wind flow around Saturn's nonaxisymmetric magnetosphere. Journal of Geophysical Research: Space Physics, 2017, 122, 9198-9206. | 2.4 | 7 |
| 25 | Cassini observations of Saturn's southern polar cusp. Journal of Geophysical Research: Space Physics, 2016, 121, 3006-3030. | 2.4 | 17 |
| 26 | Saturn's quasiperiodic magnetohydrodynamic waves. Geophysical Research Letters, 2016, 43, 11,102. | 4.0 | 16 |
| 27 | Effects of radial motion on interchange injections at Saturn. Icarus, 2016, 264, 342-351. | 2.5 | 33 |
| 28 | Transport of Mass, Momentum and Energy in Planetary Magnetodisc Regions. Space Sciences Series of ISSI, 2016, , 229-299. | 0.0 | 0 |
| 29 | Internally driven largeâ€scale changes in the size of Saturn's magnetosphere. Journal of Geophysical Research: Space Physics, 2015, 120, 7289-7306. | 2.4 | 39 |
| 30 | A model of force balance in Jupiter's magnetodisc including hot plasma pressure anisotropy. Journal of Geophysical Research: Space Physics, 2015, 120, 10,185. | 2.4 | 34 |
| 31 | The EChO science case. Experimental Astronomy, 2015, 40, 329-391. | 3.7 | 31 |
| 32 | Asymmetries observed in Saturn's magnetopause geometry. Geophysical Research Letters, 2015, 42, 6890-6898. | 4.0 | 18 |
| 33 | The effect of including fieldâ€aligned potentials in the coupling between Jupiter's thermosphere, ionosphere, and magnetosphere. Journal of Geophysical Research: Space Physics, 2015, 120, 6987-7005. | 2.4 | 14 |
| 34 | Analysis of a coronal mass ejection and corotating interaction region as they travel from the Sun passing Venus, Earth, Mars, and Saturn. Journal of Geophysical Research: Space Physics, 2015, 120, 1566-1588. | 2.4 | 33 |
| 35 | 1. Transport of Mass, Momentum and Energy in Planetary Magnetodisc Regions. Space Science Reviews, 2015, 187, 229-299. | 8.1 | 32 |
| 36 | Giant Planet Magnetodiscs and Auroraeâ€"An Introduction. Space Science Reviews, 2015, 187, 1-3. | 8.1 | 3 |

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| 37 | Response of the Jovian thermosphere to variations in solar EUV flux. Journal of Geophysical Research: Space Physics, 2014, 119, 3664-3682. | 2.4 | 9 |
| 38 | Local time variations in Jupiter's magnetosphereâ€ionosphere coupling system. Journal of Geophysical Research: Space Physics, 2014, 119, 4740-4751. | 2.4 | 32 |
| 39 | The science case for an orbital mission to Uranus: Exploring the origins and evolution of ice giant planets. Planetary and Space Science, 2014, 104, 122-140. | 1.7 | 56 |
| 40 | Response of the Jovian thermosphere to a transient â€˜pulseâ€™ in solar wind pressure. Planetary and Space Science, 2014, 91, 27-44. | 1.7 | 34 |
| 41 | Neptune and Triton: Essential pieces of the Solar System puzzle. Planetary and Space Science, 2014, 104, 108-121. | 1.7 | 34 |
| 42 | Saturn's dynamic magnetotail: A comprehensive magnetic field and plasma survey of plasmoids and traveling compression regions and their role in global magnetospheric dynamics. Journal of Geophysical Research: Space Physics, 2014, 119, 5465-5494. | 2.4 | 69 |
| 43 | Polar confinement of Saturn's magnetosphere revealed by in situ Cassini observations. Journal of Geophysical Research: Space Physics, 2014, 119, 2858-2875. | 2.4 | 21 |
| 44 | A combined model of pressure variations in Titan's plasma environment. Geophysical Research Letters, 2014, 41, 8730-8735. | 4.0 | 10 |
| 45 | Auroral counterpart of magnetic field dipolarizations in Saturn's tail. Planetary and Space Science, 2013, 82-83, 34-42. | 1.7 | 53 |
| 46 | EChO. Experimental Astronomy, 2012, 34, 311-353. | 3.7 | 98 |
| 47 | Cassini observations of ion and electron beams at Saturn and their relationship to infrared auroral arcs. Journal of Geophysical Research, 2012, 117, . | 3.3 | 47 |
| 48 | Statistical ring current of Saturn. Journal of Geophysical Research, 2012, 117, n/a-n/a. | 3.3 | 14 |
| 49 | Earthâ€based detection of Uranus' aurorae. Geophysical Research Letters, 2012, 39, . | 4.0 | 51 |
| 50 | Saturn's auroral/polar H<sub>3</sub><sup>+</sup> infrared emission: The effect of solar wind compression. Journal of Geophysical Research, 2012, 117, . | 3.3 | 13 |
| 51 | Uranus Pathfinder: exploring the origins and evolution of Ice Giant planets. Experimental Astronomy, 2012, 33, 753-791. | 3.7 | 44 |
| 52 | Influence of upstream solar wind on thermospheric flows at Jupiter. Planetary and Space Science, 2012, 61, 15-31. | 1.7 | 23 |
| 53 | Surface waves on Saturn's magnetopause. Planetary and Space Science, 2012, 65, 109-121. | 1.7 | 36 |
| 54 | Axial symmetry breaking of Saturnâ€™s thermosphere. Monthly Notices of the Royal Astronomical Society, 2012, 422, 1460-1488. | 4.4 | 13 |

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| 55 | Location of Saturn's northern infrared aurora determined from Cassini VIMS images. Geophysical Research Letters, 2011, 38, n/a-n/a. | 4.0 | 28 |
| 56 | Outer magnetospheric structure: Jupiter and Saturn compared. Journal of Geophysical Research, 2011, 116, n/a-n/a. | 3.3 | 30 |
| 57 | Electron heating at Saturn's bow shock. Journal of Geophysical Research, 2011, 116, n/a-n/a. | 3.3 | 35 |
| 58 | Electric field variability and classifications of Titan's magnetoplasma environment. Annales Geophysicae, 2011, 29, 1253-1258. | 1.6 | 12 |
| 59 | The science of EChO. Proceedings of the International Astronomical Union, 2010, 6, 359-370. | 0.0 | 5 |
| 60 | IONIZATION OF EXTRASOLAR GIANT PLANET ATMOSPHERES. Astrophysical Journal, 2010, 722, 178-187. | 4.5 | 44 |
| 61 | A model of force balance in Saturn's magnetodisc. Monthly Notices of the Royal Astronomical Society, 2010, 401, 2349-2371. | 4.4 | 73 |
| 62 | Global configuration of Saturn's magnetic field derived from observations. Geophysical Research Letters, 2010, 37, . | 4.0 | 11 |
| 63 | Influence of hot plasma pressure on the global structure of Saturnâ€™s magnetodisk. Geophysical Research Letters, 2010, 37, . | 4.0 | 33 |
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| 66 | TandEM: Titan and Enceladus mission. Experimental Astronomy, 2009, 23, 893-946. | 3.7 | 77 |
| 67 | The VOISE algorithm: a versatile tool for automatic segmentation of astronomical images. Monthly Notices of the Royal Astronomical Society, 2009, 398, 1254-1262. | 4.4 | 2 |
| 68 | No sodium in the vapour plumes of Enceladus. Nature, 2009, 459, 1102-1104. | 27.8 | 41 |
| 69 | The variability of Titan's magnetic environment. Planetary and Space Science, 2009, 57, 1813-1820. | 1.7 | 56 |
| 70 | Surface waves on Saturn's dawn flank magnetopause driven by the Kelvinâ€“Helmholtz instability. Planetary and Space Science, 2009, 57, 1769-1778. | 1.7 | 68 |
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| 73 | Saturn's magnetodisc current sheet. Journal of Geophysical Research, 2008, 113, . | 3.3 | 89 |
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| 82 | Mass of Saturn's magnetodisc: Cassini observations. Geophysical Research Letters, 2007, 34, . | 4.0 | 57 |
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| 84 | Strong rapid dipolarizations in Saturn's magnetotail: In situ evidence of reconnection. Geophysical Research Letters, 2007, 34, . | 4.0 | 93 |
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| 92 | Bow Shock and Upstream Waves at Jupiter and Saturn: Cassini Magnetometer Observations. AIP Conference Proceedings, 2005, , . | 0.4 | 2 |
| 93 | Cassini Magnetometer Observations During Saturn Orbit Insertion. Science, 2005, 307, 1266-1270. | 12.6 | 211 |
| 94 | Titan's Magnetic Field Signature During the First Cassini Encounter. Science, 2005, 308, 992-995. | 12.6 | 133 |
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| 97 | Interplanetary conditions and magnetospheric dynamics during the Cassini orbit insertion fly-through of Saturn's magnetosphere. Journal of Geophysical Research, 2005, 110, . | 3.3 | 33 |
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| 109 | UKIRT Observations of the Impact and Consequences of Comet Shoemakerâ€“Levy 9 on Jupiterâ˜†. Icarus, 1997, 126, 107-125. | 2.5 | 24 |
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| 111 | Mid-to-Low Latitude H+3Emission from Jupiter. Icarus, 1997, 130, 57-67. | 2.5 | 72 |
| 112 | Collision of comet Shoemaker-Levy 9 with Jupiter observed by the NASA infrared telescope facility. Science, 1995, 267, 1277-1282. | 12.6 | 68 |
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| 115 | Whole earth telescope observations of the white dwarf G29-38 - Phase variations of the 615 second period. Astrophysical Journal, 1990, 357, 630. | 4.5 | 26 |
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