Jan Walkowicz

List of Publications by Year
in descending order

34 papers	443 citations	840776 11 h-index	713466 21 g-index
34 all docs	34 docs citations	34 times ranked	390 citing authors

#	Article	IF	Citations
1	Influence of the nitrogen pressure on the structure and properties of (Ti,Al)N coatings deposited by cathodic vacuum arc PVD process. Surface and Coatings Technology, 2004, 180-181, 150-157.	4.8	65
2	Influence of the structure of the composite: â€˜nitrided layer/PVD coatingâ€™ on the durability of tools for hot working. Surface and Coatings Technology, 2000, 125, 134-140.	4.8	39
3	Influence of the structure of the composite: â€˜nitrided layer/PVD coatingâ€™ on the durability of forging dies made of steel DIN-1.2367. Surface and Coatings Technology, 2004, 180-181, 506-511.	4.8	37
4	On the mechanisms of diode plasma nitriding in N2â€“H2 mixtures under DC-pulsed substrate biasing. Surface and Coatings Technology, 2003, 174-175, 1211-1219.	4.8	31
5	Duplex surface treatment of moulds for pressure casting of aluminium. Surface and Coatings Technology, 1997, 97, 453-464.	4.8	29
6	Effect of substrate temperature on properties of diamond-like films deposited by combined DC impulse vacuum-arc method. Surface and Coatings Technology, 2013, 236, 444-449.	4.8	28
7	The dependence of the structure and mechanical properties of thin ta-C coatings deposited using electromagnetic venetian blind plasma filter on their thickness. Thin Solid Films, 2017, 638, 153-158.	1.8	28
8	Optimization of nitrided case structure in composite layers created by duplex treatment on the basis of PVD coating adhesion measurement. Surface and Coatings Technology, 1999, 116-119, 370-379.	4.8	26
9	Anti-wear properties of Ti(C,N) layers deposited by the vacuum arc method. Surface and Coatings Technology, 1996, 81, 201-208.	4.8	25
10	Influence of the substrate bias potential on the properties of ta-C coatings deposited using Venetian blind plasma filter. Thin Solid Films, 2015, 581, 32-38.	1.8	19
11	The influence of the N2â€“H2 mixture composition on the spectroscopic and temporal behaviour of glow discharge characteristics in pulse-supplied nitriding processes. Surface and Coatings Technology, 2004, 180-181, 407-412.	4.8	17
12	Investigation of the influence of ion etching parameters on the structure of nitrided case in hot working steel. Surface and Coatings Technology, 1999, 116-119, 361-366.	4.8	15
13	Spatial distribution of microdroplets generated in the cathode spots of vacuum arcs. Surface and Coatings Technology, 2000, 125, 161-166.	4.8	11
14	Application of the Taguchi approach of the design of experiments for determination constructional and working parameters of the linear Venetian blind microdroplet filter. Vacuum, 2012, 86, 1248-1254.	3.5	7
15	Space-Time Diagnostics of Reactive Impulse Plasma. IEEE Transactions on Plasma Science, 1987, 15, 603-608.	1.3	6
16	Spectral characteristics of vacuum arc discharges with Ti and Zr cathodes. Surface and Coatings Technology, 2003, 174-175, 952-958.	4.8	6
17	Optical emission diagnostics of cathodic arc plasmas used for deposition of TiN and Ti(C, N) coatings. Surface and Coatings Technology, 2004, 180-181, 401-406.	4.8	6
18	Corrosion properties of zirconium-based ceramic coatings for micro-bearing and biomedical applications. Journal of Physics: Conference Series, 2016, 700, 012026.	0.4	6

#	Article	IF	Citations
19	Research on physico-chemical bases of the ion nitriding process control with the use of plasma spectroscopic diagnostics. Vacuum, 2000, 56, 63-69.	3.5	5
20	Pulsed-plasma assisted magnetron methods of depositing TiN coatings. Surface and Coatings Technology, 2000, 125, 341-346.	4.8	5
21	Optimization of the ASPN Process to Bright Nitriding of Woodworking Tools Using the Taguchi Approach. Journal of Materials Engineering and Performance, 2013, 22, 410-420.	2.5	5
22	Mechanical properties of tantalum-based ceramic coatings for biomedical applications. Journal of Physics: Conference Series, 2018, 992, 012034.	0.4	5
23	Optical emission diagnostics of the linear magnetron sputtering discharge. Surface and Coatings Technology, 1999, 116-119, 1076-1082.	4.8	4
24	Deposition of AlN layers by collimation magnetron sputtering. Surface and Coatings Technology, 1998, 98, 1298-1303.	4.8	3
25	Spaceâ€“time spectral investigation of the distribution of pulsed plasma generated by a new coaxial hybrid source. Surface and Coatings Technology, 1999, 116-119, 666-673.	4.8	3
26	Characterization of a plasma generated by a multisource vacuum arc with zirconium cathodes in a reactive gas atmosphere. Surface and Coatings Technology, 2004, 180-181, 396-400.	4.8	3
27	Study on reactive sputtering of titanium in the linear magnetron discharge. Surface and Coatings Technology, 2006, 201, 3571-3576.	4.8	3
28	RESULTS OF PRODUCTION TESTS AND ANALYSIS OF DESTRUCTION MECHANISMS OF HOT FORGING DIES COVERED BY THE COMPOSITE Â„NITRIDING LAYER/CrN COATINGÂ”. High Temperature Material Processes, 2005, 9, 299-306.	0.6	2
29	Analysis of plasma generation and acceleration in pulsed coaxial hybrid source. Surface and Coatings Technology, 1999, 116-119, 685-689.	4.8	1
30	Ellipsometric characteristics of diamond-like a-C:H films obtained by the r.f. PACVD method. Surface and Coatings Technology, 2003, 174-175, 345-350.	4.8	1
31	MODERN PLASMA TECHNOLOGIES FOR ANTI-WEAR APPLICATIONS. High Temperature Material Processes, 2001, 5, 6.	0.6	1
32	INFLUENCE OF THE SUBSTRATE SHAPE AND INTENSITY OF THE ION ETCHING PROCESS ON ADHESION OF THE CrN COATING OBTAINED ON THE NITRIDED SUBSTRATE. High Temperature Material Processes, 2004, 8, 301-312.	0.6	1
33	Plasma parameters in some industrial vacuum arc deposition systems. Vacuum, 2005, 78, 59-66.	3.5	0
34	DEPOSITION OF TiN COATINGS WITH THE USE OF A COAXIAL HYBRID SOURCE. High Temperature Material Processes, 2001, 5, 6.	0.6	0