

TECHSPEC®

λ/4-Quarzglasfenster, 75 mm Durchm., 4 mm Dicke, UV-beschichtet



TECHSPEC® λ/4 UV Fused Silica Windows

Produkt **#25-646**

KONTAKT

-

1

+

€398^{.00}

+ WARENKORB

Mengenrabatte	
Stk. 1-5	€398,00 stückpreis
Stk. 6-25	€317,00 stückpreis
Stk. 26-49	€297,00 stückpreis
Need More?	Angebotsanfrage

 Preise exklusiv der geltenden Mehrwertsteuer und Abgaben

Downloadbereich

Produktdetails

Protective Window

Typ:

Physikalische und mechanische Eigenschaften

Protective as needed

Fase:

Freie Apertur (%):

90	
67.50	Freie Apertur CA (mm):
75.00 +0.00/-0.10	Durchmesser (mm):
4.00 ±0.10	Dicke (mm):
Fine Ground	Kanten:
522.00	Knoop-Härte (kg/mm²):
<1	Parallelität (Bogenminuten):
0.16	Poisson-Zahl:
73	Elastizitätsmodul (GPa):

Optische Eigenschaften

67.8	Abbe-Zahl (v _d):
UV-AR (250-425nm)	Beschichtung:
Beschichtungsspezifikation: R _{abs} ≤1.0% @ 250 - 425nm R _{avg} ≤0.75% @ 250 - 425nm R _{avg} ≤0.5% @ 370 - 420nm	
1.458	Brechungsindex (n _d):
Fused Silica (Corning 7980)	Substrat:
40-20	Oberflächenqualität:
λ/4	Transmittierte Wellenfront, P-V:
250 - 450	Wellenlängenbereich (nm):
Zerstörschwelle, Referenz: ☐ 3 J/cm² @ 355nm, 10ns	

Materialeigenschaften

Thermischer Ausdehnungskoeffizient CTE (10 ⁻⁶ /°C): 0.52 (+5 to +35°C) 0.57 (0 to +200°C) 0.48 (-100 to +200°C)	
2.20	Dichte (g/cm³):

Konformität mit Standards

Konform	RoHS 2015:
Anzeigen	Konformitätszertifikat:
Konform	REACH 241:

Produktdetails

- Verfügbar unbeschichtet sowie BBAR-beschichtet für UV, VIS und NIR
 - Ideal für Bildverarbeitungsanwendungen
 - Rund oder rechteckig mit Größen von 5 bis 200 mm
 - 1λ- oder λ/10-Fenster aus UV-Quarzglas sind ebenfalls verfügbar
- TECHSPEC® λ/4-Fenster aus UV-Quarzglas haben eine Oberflächenqualität von 40-20 und einen transmittierten Wellenfrontfehler von λ/4. Dies macht sie ideal für Bildverarbeitungsanwendungen. Die Fenster bestehen aus UV-Quarzglassubstraten und bieten eine hohe Transmission vom ultravioletten über den sichtbaren bis zum nahinfraroten Bereich. Es sind breitbandige Antireflexionsbeschichtungen (BBAR) verfügbar, um Reflexionsverluste zu minimieren und die Transmission zu erhöhen. TECHSPEC® λ/4-Fenster aus UV-Quarzglas werden in optischen Bildgebungsanwendungen, in Laseranwendungen mit geringer oder mittlerer Leistung und als Schutzfenster für Anwendungen, die eine hohe UV-Transmission erfordern, eingesetzt.

Technische Informationen



FUSED SILICA		
Uncoated Fused Silica Typical Transmission Typical transmission of a 3mm thick, uncoated fused silica window across the UV - NIR spectra. Click Here to Download Data		
Fused Silica with MgF₂ Coating Typical Transmission Typical transmission of a 3mm thick fused silica window with MgF₂ (400-700nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{avg} \leq 1.75\%$ @ 400 - 700nm (N-BK7) Data outside this range is not guaranteed and is for reference only. Click Here to Download Data		
Fused Silica with UV-AR Coating Typical Transmission Typical transmission of a 3mm thick fused silica window with UV-AR (250-425nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{abs} \leq 1.0\%$ @ 250 - 425nm $R_{avg} \leq 0.75\%$ @ 250 - 425nm $R_{avg} \leq 0.5\%$ @ 370 - 420nm Data outside this range is not guaranteed and is for reference only. Click Here to Download Data		

	
Fused Silica with UV-VIS Coating Typical Transmission 	Typical transmission of a 3mm thick fused silica window with UV-VIS (250-700nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{abs} \leq 1.0\% \text{ @ } 350 - 450\text{nm}$$R_{avg} \leq 1.5\% \text{ @ } 250 - 700\text{nm}$ Data outside this range is not guaranteed and is for reference only. Click Here to Download Data
Fused Silica with VIS-EXT Coating Typical Transmission 	Typical transmission of a 3mm thick fused silica window with VIS-EXT (350-700nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{avg} \leq 0.5\% \text{ @ } 350 - 700\text{nm}$ Data outside this range is not guaranteed and is for reference only. Click Here to Download Data
Fused Silica with VIS-NIR Coating Typical Transmission 	Typical transmission of a 3mm thick fused silica window with VIS-NIR (400-1000nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{abs} \leq 0.25\% \text{ @ } 880\text{nm}$$R_{avg} \leq 1.25\% \text{ @ } 400 - 870\text{nm}$$R_{avg} \leq 1.25\% \text{ @ } 890 - 1000\text{nm}$ Data outside this range is not guaranteed and is for reference only. Click Here to Download Data
Fused Silica with VIS 0° Coating Typical Transmission 	Typical transmission of a 3mm thick fused silica window with VIS 0° (425-675nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{avg} \leq 0.4\% \text{ @ } 425 - 675\text{nm}$ Data outside this range is not guaranteed and is for reference only. Click Here to Download Data

Wavelength (nm) Fused Silica with YAG-BBAR Coating Typical Transmission <table border="1"><caption>Approximate data for Fused Silica with YAG-BBAR Coating</caption><thead><tr><th>Wavelength (nm)</th><th>Transmission T (%)</th></tr></thead><tbody><tr><td>200</td><td>70</td></tr><tr><td>300</td><td>87</td></tr><tr><td>400</td><td>98</td></tr><tr><td>500</td><td>100</td></tr><tr><td>600</td><td>99</td></tr><tr><td>800</td><td>98</td></tr><tr><td>1000</td><td>100</td></tr><tr><td>1100</td><td>100</td></tr><tr><td>1200</td><td>98</td></tr><tr><td>1400</td><td>88</td></tr><tr><td>1600</td><td>80</td></tr></tbody></table>	Wavelength (nm)	Transmission T (%)	200	70	300	87	400	98	500	100	600	99	800	98	1000	100	1100	100	1200	98	1400	88	1600	80	Typical transmission of a 3mm thick fused silica window with YAG-BBAR (500-1100nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{abs} \leq 0.25\%$ @ 532nm $R_{abs} \leq 0.25\%$ @ 1064nm $R_{avg} \leq 1.0\%$ @ 500 - 1100nm Data outside this range is not guaranteed and is for reference only. Click Here to Download Data
Wavelength (nm)	Transmission T (%)																								
200	70																								
300	87																								
400	98																								
500	100																								
600	99																								
800	98																								
1000	100																								
1100	100																								
1200	98																								
1400	88																								
1600	80																								
Wavelength (nm) Fused Silica with NIR I Coating Typical Transmission <table border="1"><caption>Approximate data for Fused Silica with NIR I Coating</caption><thead><tr><th>Wavelength (nm)</th><th>Transmission T (%)</th></tr></thead><tbody><tr><td>200</td><td>70</td></tr><tr><td>400</td><td>98</td></tr><tr><td>500</td><td>100</td></tr><tr><td>600</td><td>100</td></tr><tr><td>800</td><td>100</td></tr><tr><td>1000</td><td>100</td></tr><tr><td>1050</td><td>100</td></tr><tr><td>1200</td><td>98</td></tr><tr><td>1400</td><td>85</td></tr><tr><td>1600</td><td>78</td></tr></tbody></table>	Wavelength (nm)	Transmission T (%)	200	70	400	98	500	100	600	100	800	100	1000	100	1050	100	1200	98	1400	85	1600	78	Typical transmission of a 3mm thick fused silica window with NIR I (600 - 1050nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{avg} \leq 0.5\%$ @ 600 - 1050nm Data outside this range is not guaranteed and is for reference only. Click Here to Download Data		
Wavelength (nm)	Transmission T (%)																								
200	70																								
400	98																								
500	100																								
600	100																								
800	100																								
1000	100																								
1050	100																								
1200	98																								
1400	85																								
1600	78																								
Wavelength (nm) Fused Silica with NIR II Coating Typical Transmission <table border="1"><caption>Approximate data for Fused Silica with NIR II Coating</caption><thead><tr><th>Wavelength (nm)</th><th>Transmission T (%)</th></tr></thead><tbody><tr><td>200</td><td>70</td></tr><tr><td>400</td><td>94</td></tr><tr><td>500</td><td>96</td></tr><tr><td>600</td><td>100</td></tr><tr><td>750</td><td>100</td></tr><tr><td>1000</td><td>100</td></tr><tr><td>1200</td><td>100</td></tr><tr><td>1400</td><td>98</td></tr><tr><td>1550</td><td>100</td></tr><tr><td>1800</td><td>96</td></tr><tr><td>2000</td><td>91</td></tr></tbody></table>	Wavelength (nm)	Transmission T (%)	200	70	400	94	500	96	600	100	750	100	1000	100	1200	100	1400	98	1550	100	1800	96	2000	91	Typical transmission of a 3mm thick fused silica window with NIR II (750 - 1550nm) coating at 0° AOI. The blue shaded region indicates the coating design wavelength range, with the following specification: $R_{abs} \leq 1.5\%$ @ 750 - 800nm $R_{abs} \leq 1.0\%$ @ 800 - 1550nm $R_{avg} \leq 0.7\%$ @ 750 - 1550nm Data outside this range is not guaranteed and is for reference only. Click Here to Download Data
Wavelength (nm)	Transmission T (%)																								
200	70																								
400	94																								
500	96																								
600	100																								
750	100																								
1000	100																								
1200	100																								
1400	98																								
1550	100																								
1800	96																								
2000	91																								

Kundenspezifische Produkte

Edmund Optics bietet einen umfangreichen kundenspezifischen Fertigungsservice für Optik- und Bildverarbeitungskomponenten an, speziell hergestellt für Ihre Anwendungsanforderungen. Wir ermöglichen flexible Lösungen für Ihre Bedürfnisse – von der Prototypenphase bis zur Serienfertigung. Unsere erfahrenen IngenieurInnen freuen sich auf die Zusammenarbeit und unterstützen Sie bei jedem Projektschritt.

Unser Service beinhaltet:

- Kundenspezifische Abmessungen, Materialien und mehr
- Hochpräzise Oberflächenqualität und -ebenheit
- Enge Toleranzen und komplexe Formen
- Skalierbare Produktion – vom Prototypen zur Serie

Erfahren Sie mehr über unsere [kundenspezifischen Fertigungsmöglichkeiten](#) oder senden Sie [hier](#) eine Anfrage.