

# YVS 410 TUH

Thermally Broken, Impact Resistant and Blast Mitigating Hung Window

ProTek



YKK AP Hurricane & Blast Solutions

## Impact Protection and Style

The YVS 410 TUH ProTek® Hung Window is designed to capture the side rails of the sash, providing a high level of security and dependability for both new construction and renovation projects. The use of YKK AP's ThermoBond Plus® poured and de-bridged system provides superior thermal qualities. The windows have successfully passed the impact and cycle requirements of ASTM E-1886, ASTM E 1996, and the test requirements for the Florida High Velocity Hurricane Zone (TAS 201, TAS 202, & TAS 203). A full selection of quality block and tackle, spiral, and Class 5 Ultra-Lift® balances are available. Optional SecurSweep sweep locks are available that incorporate a special security latch to prevent tampering from the outside.

## Product Options & Features

- AAMA/NAFS 101/I.S.2/NAFS-02 with AW-65
- Florida state-wide approval +80/-120 PSF
- 4" frame depth
- Integrates with YFW 400 TUH Fixed Window
- Accepts 1-1/16" Large & Small Missile glazing
- Factory glazing and screens

**U-Factor** Values as low as **0.46\***

\*Based on AAMA 507. Lower values may be achieved through further simulation.



YKK  
ap®

Quality  
inspires®



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## SYSTEM SPECIFICATIONS

System Sightline	Base Depth	Glazing & Config	Glass	Air Infiltration	Water Infiltration	Acoustical Performance
2"	4"	Pre-Glazed & Vertical Hung	1-1/16" IGU with Low-E (C.O.G. U-factor: 0.29)	0.30 CFM/FT <sup>2</sup> (16.5 m <sup>3</sup> /h-m <sup>2</sup> )	<b>Static:</b> 12 PSF (575 Pa) <b>Dynamic:</b> 12 PSF (575 Pa)	<b>Lam STC:</b> 36 <b>Lam OITC:</b> 22
<b>Testing Standards</b>				ASTM E 283	ASTM E 331 & AAMA 501	ASTM E 90 & 1425
<b>Florida Product Approval</b>				Large and Small Missile, HVHZ, ICC Compliant		
<b>Available Finishes</b>				Factory Anodized (AAMA 612) and Organic Paints (AAMA 2604 & AAMA 2605)		

Thermal Performance						
1" IGU	BTU/hr·ft <sup>2</sup> ·°F					
C.O.G U-Factor	0.30	0.28	0.26	0.24	0.22	0.20
2" x 4"	0.52	0.51	0.49	0.48	0.47	0.46
Testing Standards	AAMA 507					

CRF	
Frame	Glass
Not Tested	Not Tested
AAMA 1503	

## HARDWARE OPTIONS



Auto Sill Lock



Sweep Locks (OPTIONAL)



Class 5 Balance

## GRID AND PANNING



The first image shows the combination of panning and fixed windows. The second image shows triple hung window openings. The panning shipped in stock lengths and was custom mitered prior to installing the panning.

## THERMALLY BROKEN

ThermaBond Plus® process is a pour and debridged process that greatly improves the adhesion of the polyurethane material to the aluminum extrusion. Combining science and technology, ThermaBond Plus® process resolves the problem of adhesion and the resulting dry shrinkage associated with typical poured and debridged systems.

Additional information including CAD details, CSI specifications, Test Reports and Installation instructions are available online at: [www.ykkap.com/commercial/product/architectural-windows/yvs-410-tuh/](http://www.ykkap.com/commercial/product/architectural-windows/yvs-410-tuh/)