

## PVC Cladding with Active Antimicrobial Protection



### Overview

Innovative HYG technology has set a new standard in hygienic cladding by offering active antimicrobial cladding with low maintenance requirements. PALCLAD HYG has either killed or inhibited growth of all pathogens tested to date. As silver ions are uniformly distributed throughout the sheet, scratched or damaged surfaces will be equally effective.

Overall maintenance costs can be reduced even further since PALCLAD HYG requires less concentrated and more economical cleaning agents in comparison with standard cladding.

### Main Benefit

- Active antimicrobial protection: Kills microbes
- Complete hygienic cladding system
- Exclusive HYG profiles
- Long lasting antimicrobial effect
- Biocidal capabilities proven by independent tests
- Resists a wide range of chemicals
- Withstands frequent cleaning
- Rigid PVC: not digestible by bacteria
- High fire resistance
- Excellent adhesion properties
- Easy to install and maintain
- Formable: HYG properties are maintained after processing

### Typical Application

#### Medical

- Sterile/clean rooms
- Hospitals
- Clinics
- Pharmaceutical plants

#### Food Industry

- Food manufacturing facilities
- Sorting halls
- Storage/refrigeration rooms
- Food transport trucks

#### Public Facilities

- Schools
- Restrooms
- Airports
- Kitchens



## Product Availability

HYG Products are currently available as PALCLAD flat sheets in standard thicknesses and dimensions (see information below). For more information on HYG products please contact Hansraj.

### Standard PALCLAD™ Dimensions

Width x Length (mm)	Thickness (mm)
1220 x 2440	1 mm
1500 x 3000	2 mm
1500 x 3000	2.5 mm

\* Custom dimensions are available, subject to minimum quantity.

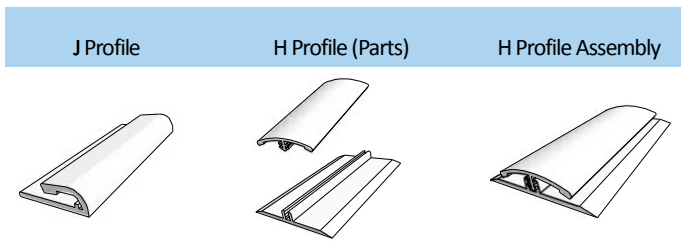
### Colors

PALCLAD HYG is available a wide range of standard and special designer colors.



## HYG Cladding System

PALCLAD HYG panels are offered as complete cladding system. The profiles, listed below, are offered with the same antimicrobial effect matching colors as the panels.



## PALCLAD Typical Physical Properties

Property	Method*	Condition	Units	Value
Density	D-792		g/cm <sup>3</sup>	1.4
Heat deflection temperature (H.D.T)	D-648	Load: 1.82MPa	°C	65 - 68
Service Temperature			°C	-10 to +50
Thermal conductivity	C-177		W/m K	0.15
Coefficient of linear thermal expansion	D-696		cm/cm°C	6.7x10 <sup>-5</sup>
Rockwell hardness	D-785		R Scale	97R
Tensile strength at yield	D-638	10 mm/min.	MPa	52
Tensile strength at break	D-638	10 mm/min.	MPa	50
Elongation at yield	D-638	10 mm/min.	%	3
Elongation at break	D-638	10 mm/min.	%	140
Tensile modulus of elasticity	D-638	1 mm/min.	MPa	2,900
Flexural strength	D-790	1.3 mm/min.	MPa	80
Flexural modulus	D-790	1.3 mm/min.	MPa	2,700
Impact falling weight	ISO 6603/1 E50	3 mm sheet	J	95

\* ASTM except where noted otherwise

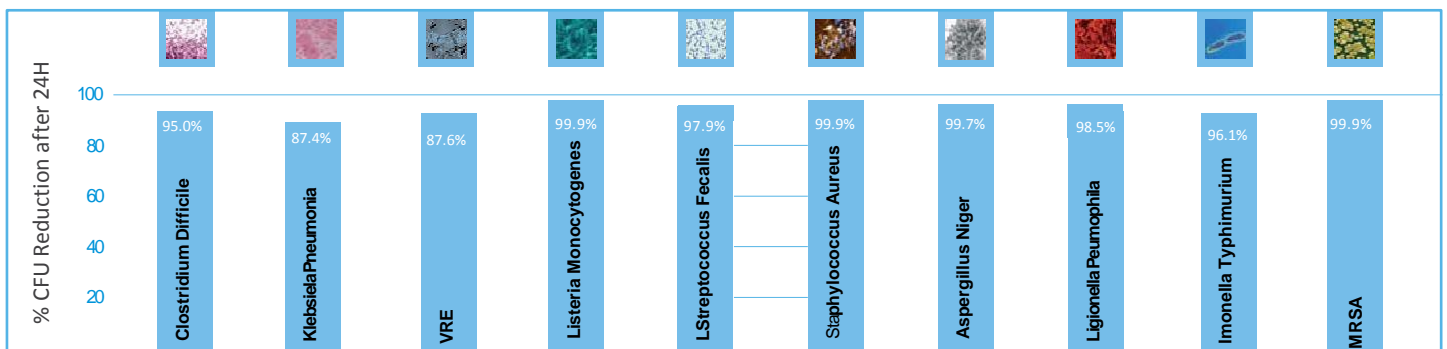
## Flammability

PALCLAD HYG is self-extinguishing and complies with the most demanding international fire resistance standards defined in the field of plastics, as shown in the following table.

Standard	Classification*
EN 13501	B,s3,d0
DIN4102	B-1
BS476/7	Class1
NSP92501,5	M-1
ASTME84	ClassA

\* Depends on thickness

## Microbe Elimination Test\*



\*In an independent lab test, 10 common microbes were selected, and each of them was incubated on PALCLAD HYG panels for 24hrs at 37°C and >90% RH. As the graph shows, HYG panels demonstrate high antimicrobial activity. Use of HYG Products, along with adequate cleaning regime, would significantly reduce microbial growth, including dangerous pathogens.



**HANSRAJ H.Q.**  
Tel: +91 022 2630 4581  
mumbai@hansrajnayyar.com

**HANSRAJ DELHI**  
Tel: +91 11 4248 1530  
delhi@hansrajnayyar.com

**HANSRAJ CHENNAI**  
Tel: +91 44 2858 2501  
chennai@hansrajnayyar.com



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