

STEELGUARD™

The superior cellulosic fire protection solution



**PPG Protective &
Marine Coatings**

Bringing innovation to the surface.™



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The superior cellulosic fire protection solution

PPG Protective & Marine Coatings (PPG) is a world leader in protective and marine coatings.

Our global capabilities and respected protective coatings brands enable us to provide our customers with exceptional products, performance and service. Our proven and trusted products protect a wide range of assets for the most demanding markets and environments, including:

- Civil Infrastructure
- Marine
- Mining
- Offshore
- Petrochemical
- Power
- Rail

PPG has the scale and resources to deliver outstanding support with well-established operations in over 60 countries. Continuous development ensures that we provide optimum solutions for asset owners, contractors, fabricators and applicators across the globe, helping our customers to meet the challenges they face today and tomorrow.

Experience, innovation and integrity – that is what makes PPG the ideal coatings partner.

Protection of steel structures from cellulosic fire

Specially formulated to help save lives and protect assets

STEELGUARD is a complete range of intumescent coating systems for various grades of fire protection, climatic exposure conditions and application techniques.

These market-leading coatings are specifically formulated to provide superb fire protection for civil buildings, particularly appropriate where exposed steel structures have been used as part of the design in buildings such as shopping centers, airport terminals, sports stadia and schools. But if a fire strikes, the potential for disaster is frightening. Within minutes unprotected steel can reach the critical temperature that causes it to lose stability and collapse.

The value of *STEELGUARD* intumescent coatings is that they provide the vital extra time to help people escape and also allow fire fighters to save the building itself.

Independent certification – international approval

PPG is certified to ISO 9001, recognized around the world as a sign of quality. *STEELGUARD* intumescent coatings meet international standards in fire protection, with each product undergoing a rigorous, exhaustive testing process. In addition, every production batch is checked against its specifications – so you can be assured of consistent quality and accurate fire protection levels at all times.

Benefits of the *STEELGUARD* range:

- Excellent fire protection for steel structures
- High levels of corrosion protection against atmospheric conditions with suitable top coat
- Economical and versatile
- Smooth surface – excellent aesthetics
- Topcoats available in many colors to match building design
- Off-site versions available for in-shop application
- Waterborne coatings available for on-site application
- Engineering support
- Tested to various standards and certified to local requirements
- Independently approved



The leading fire protection solution for civil building projects

STEELGUARD – specifically developed for civil buildings

- Airport terminals
- Concert halls
- Factories
- Hospitals
- Hotels
- School buildings
- Shopping centers
- Sports stadia
- Train stations
- Warehouses

Engineering support

Our engineers are fully trained in intumescent fire protection and are up to date with all relevant industry standards and fire ratings. They also have the engineering capability to help customers from the early stages of development, guiding them through the specification process and providing continuing support right through to project completion and beyond.





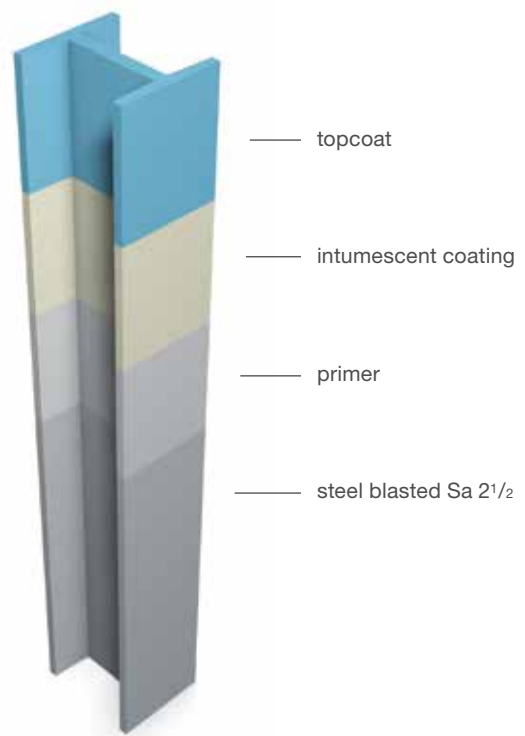
Maximum protection – superb aesthetics

STEELGUARD coatings are ideally suited for today's architects and designers, where any exposed steel is used as a design feature. These highly protective intumescent coatings also provide an extremely smooth surface that can be topcoated with colors to suit a wide range of aesthetic requirements.

The great benefit of intumescent coatings work is that they expand at high temperatures, from a very thin, lightweight coating, into a thick, foam-like layer that insulates the steel from fire. It is this insulation that maintains the steel's stability and helps to deliver the additional rescue time that can prove decisive in terms of saving lives and property.

Environmental adherence

The *STEELGUARD* intumescent range also includes coatings specifically designed for on-site use. These waterborne coatings comply with the most stringent environmental regulations, enabling applications to take place in working areas – even while people are using the building. In combination with suitable PPG topcoats, the range provides high levels of corrosion protection against a wide variety of atmospheric conditions.





Product selection

The following tables provide information on all cellulosic fire protection products in the *STEELGUARD* range and will enable you to quickly find the most suitable coating for your specific need. All products are one-component intumescent coatings suitable for off-site and on-site application.

The *STEELGUARD* range - Waterborne

Product	Minimum overcoating interval in hours (at 20°C)		Fire protection in minutes				Maximum DFT in one coat in µm	Exposure conditions (ISO 12944)				Independent approval
	With itself	With suitable top coat	30	60	90	120		C1	C2	C3	C4	
STEELGUARD 581	16	18	•	• ¹	•		700	•	•			BS476-20/21 and certified according to various national requirements
STEELGUARD FM585	16	18	•	•	•		700	•	•			BS476-20/21, ENV13381-4 and certified according to various national requirements

¹ 60 minutes from SCI assessment of beams with circular web openings
 For detailed information please see the relevant Product Data Sheet and the *STEELGUARD* Application Guidelines

The **STEELGUARD** range - Solvent-borne

Product	Minimum overcoating interval in hours (at 20°C)		Fire protection in minutes					Maximum DFT in one coat in µm	Exposure conditions (ISO 12944)				Independent approval
	With itself	With suitable top coat	30	60	90	120	150		C1	C2	C3	C4	
STEELGUARD FM549	6	48 ³	•	•	•	•		1,500	•	•			BS476 20/21, AS1530:4 and certified according to various national requirements
STEELGUARD FM550 ²	6	48 ³	•	•	•	•	•	1,500	•	•	•	•	BS476 20/21, UL263, AS1530:4, GB14907 and certified according to various national requirements
STEELGUARD FM560 ²	4	24 ⁴	•	•	•	•		1,000	•	•	•	•	BS476 20/21, AS1530:4 and certified according to various national requirements. Factory Mutual approved
STEELGUARD 551 ²	6	48 ³	•	•				1,500	•	•	•	•	BS476-20/21 and certified according to various national requirements
STEELGUARD 552 ²	6	48 ³	•	• ¹				1,500	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements
STEELGUARD 553 ²	6	48 ³			•			1,500	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements
STEELGUARD 554 ²	6	48 ³				•		1,500	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements
STEELGUARD 561 ²	4	24 ⁴	•	•	•	•		1,000	•	•	•	•	BS476 20/21 and GOST R 53295-2009, and certified according to various national requirements
STEELGUARD 562 ²	4	24 ⁴	•	• ¹				1,000	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements. Factory Mutual approved
STEELGUARD 563 ²	4	24 ⁴			•			1,000	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements. Factory Mutual approved
STEELGUARD 564 ²	4	24 ⁴				•		1,000	•	•	•	•	BS476-20/21, ENV13381-4 and certified according to various national requirements. Factory Mutual approved
STEELGUARD 701	6	48	•	•	•			1,500	•	•	•	•	EN 13381-8, BS476 20/21, LPBC - Red Book listing for solid rods and certified according to various national requirements
STEELGUARD 702	6	48	•	•	•			1,500	•	•	•	•	EN 13381-8 and certified according to various national requirements
STEELGUARD 801	4	24	•	•	•			1,000	•	•	•	•	EN 13381-8, BS476 20/21, LPBC - Red Book listing for solid rods and certified according to various national requirements

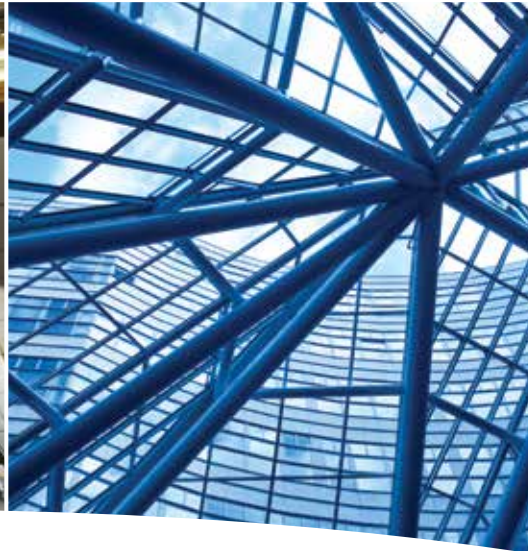
¹ 60 minutes from SCI assessment of beams with circular web openings

² Weather resistant up to 12 months without topcoat

³ 60 minutes with *STEELGUARD* 2458

⁴ 30 minutes with *STEELGUARD* 2458

For detailed information please see the relevant Product Data Sheet and the *STEELGUARD* Application Guidelines.



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