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# Directions for RAUVISIO noir™ compact use and applications

DISCLAIMER: The technical suggestions provided are designed to provide you with the best results when working with RAUVISIO noir compact.

### RAUVISIO noir™ compact Monotonic Matte Surface

RAUVISIO noir compact is a 12mm thick solid core panel produced of synthetic thermosetting resins. The double-sided, balanced panel has identical monotonic matte surfaces on both sides with a color matched core.

# **Transporting**

Place the panels on pallets and protect the sheets with wrapping paper and polyethylene film. Fix the sheets to the pallets with metal straps, and cover the edges with plastic protections. This will prevent the sheets from slipping and causing scratches or breakage.

During loading and unloading operations, lift the sheets manually or with a mechanical lift to prevent the sheets from scraping against each other or slipping.

### Storage

Panels need to be stored at a temperature between 64.4 - 71.6 F (18 - 22 C) with 40-60% humidity.

Always place the panels horizontally.

# **Cutting**

When cutting compact, we recommend using a low feed speed, which will have to be worked out depending on the panel thickness and on the desired cutting quality. For the sectioning of double-sided panels, you will need to adjust the height of the blade to avoid damaging the lower side. To achieve optimal results, we recommend you use a saw with a marking gauge.

Optimal values:

Revolutions: 3000-4000 rpm.
Tooth pitch: 10-15 mm
Feeding speed: 10-20 m/min.

To ensure best results, always comply with instructions from the blade manufacturer.

Producing cabinet doors or bathroom partitions - the long side should be cut longitudinally in the direction of the fiber to avoid possible tensioning which may result in distortions to the panel.

### **Screwing**

Compact tends to contract at low humidity rates and expand at high humidity. When piercing, you need to account for changes in dimension around the screw (hole diameter = screw diameter + 0.5 mm) to avoid cracks. Mill the hole and use plastic or metal washers to avoid tightening the screw too much against the surface.

Always rest the panel on a solid surface (either wood or plywood) to avoid splints on the opposite side.

When making dead holes for screws or mortises, always allow at least 1.5 mm from the panel thickness. A simple tag for treading will allow you to easily pierce the compact panel. You can also use self-tapping screws.

# **Horizontal Applications**

When installing as a horizontal surface, the finished panel needs to be properly supported. There can be a maximum of 50cm (19.6") from one support to another. There can be a maximum of 30cm (12") from a support to the edge of the finished panel. A wooden substrate, such as plywood, can be used to support the finished panel as well

# Miling and Edge Finishing

Finishing requires milling and rounding the edges of the compact. Use a fine-grained sanding paper and polish the edges with a silicon-free furniture polish. Round the corners to avoid any damages.

Internal openings should also have rounded corners.

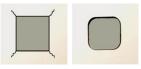


Fig. 1.2 Unsafe cut – Straight angle Safe cut with rounded corners

# **Assembly**

There are several assembly options with compact panels including wooden substructures, aluminum frames and fastening with screws or aluminum rivets. It is important to take into account the effects of

temperature and humidity changes which result in slight changes in size. This can be accomplished by arranging for slightly larger holes during assembly, or placing a joint between the sheets.

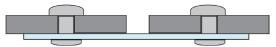


Fig. 2.2 Fastening accoplished with rivets

# **Self-Tapping Screws**

Self-tapping screws are used to fix different types of pieces. Triangular-head screws with three quick threads one above the other are the best.

The hole needs to have a diameter **B** equal to the diameter of the screw **A** minus the widths of the thread **C**. The hole must be at least 1 mm deeper than the length of the screw.

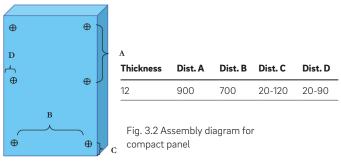
The screws should be lubricated beforehand.



# **Assembling the Panels**

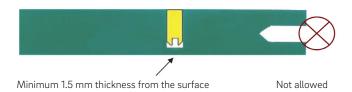
Rivets, self-tapping screws or door hinges are needed for assembling panels in projects with partitions, booths, cabinets, changing areas. A certain distance tolerance is also needed.

See the diagram and table below:



# Plugs

Plugs need to be smooth and free from any protuberances. They should never completely penetrate the panel and leave at least 1.5 mm thickness. Never insert a plug or wedge into the edge of a panel.



### **Glued Sheets**

The panels are subject to changes length and width. If you need to glue a number of panels together, you need to align the fibers in the same direction. Directionality needs to be identified whole, and before processing. Always smooth the surface before gluing.

# **Application Fields**

RAUVISIO noir compact panels can be widely applied in all sorts of different fields such as: the creation of doors, partition walls, toilet partitions, changing room cabinets, cabinets for communities, hospitals and laboratories.



Fig. 4.2 Toilet cubicles



Fig. 5.2 Changing room cabinets



Fig. 6.2 Partition panels

