Advice section Resilient floor coverings Vinyl flooring Modular ONE Eco Balance PUR

PARADOR

Table of contents

Table of contents	Page	2
Useful information	Page	3
Product structure	Page	5
Accessories	Page	8
Basic installation rules	Page	11
Installation options	Page	15
Assembly	Page	16
Tips	Page	23
Retain value		
Frequently asked questions	Page	26
Annex		
Check list for whole-area gluing	Page	28
Acceptance protocol for trades	Page	29
Check list for installation on hot water underfloor heating	Page	30

You will find important information about installation on the pack leaflets or product packaging. For special applications, additional information is also available through Parador Application Technology. Please also pay attention to the technical data sheets, declarations of performance, certificates, and installation videos, which you will find on the Parador website www.parador.eu.

Heating protocol for hot water underfloor heating...... Page 31

The following standards are also relevant for the use of resilient floor coverings:

DIN 18202	Tolerances in building construction
DIN 18299	General conditions for construction work of any kind
DIN 18365	Flooring work
BEB publication	Evaluation and preparation of substrates;
	heated and unheated floor constructions
Information sheet TKB-7	Gluing PVC floor coverings

Useful information

Vinyl flooring

As a modern and innovative material, vinyl flooring is the first choice for aesthetic and functional high-quality room concepts. Vinyl flooring shines in both private and commercial contexts when it comes to maximum durability. With vinyl flooring, the authentic reproduction of near-natural materials succeeds in astonishing perfection. In the three product ranges with an HDF core board, as a solid material and for gluing, vinyl flooring from Parador offers the optimal solution for every usage scenario and allows for uniformity across the various product variants.

The Basic, Classic and Trendtime product lines offer a variety of decors for every requirement, turning individual living dreams into reality. With the intelligent click system, you can quickly and effortlessly benefit from this flexible "Made in Germany" trendsetter.

Eco Balance PUR

The modern and versatile polyurethane material – in short PUR – gives the Eco Balance PUR flooring a special elasticity, which protects the joints, makes it warm underfoot and at the same time durable. Free of softeners and harmful emissions, this low-noise floor covering is resource-conserving and in particular promotes healthy living. The surfaces and decors succeed in authentic form and feel and take up current design trends. The integrated acoustic counter layer made of cork smooths out bumps in the substrate and supports the particularly pleasant room acoustics. With the "Made in Germany" distinction, Eco Balance PUR guarantees the highest standards of quality and design.

Modular ONE

This is living today: Modular ONE, the top-performing and advanced multi-layer flooring in authentic and contemporary designs. As a versatile, flexible floor covering, Modular ONE is able to withstand the challenges of everyday life – it is suitable for damp areas, is durable, promotes healthy living and easy to maintain. In addition to exclusive decors and robust surfaces with a characteristic look and feel, it inspires as a softener-free and quiet floor from head to toe. Ecologically ground-breaking, Modular ONE "Made in Germany" meets the highest standards of sustainable living.

Application possibilities for Parador resilient floor coverings

With resilient floor coverings from Parador, you have opted for a new generation of flooring. The particularly robust Parador vinyl, Modular ONE, and Eco Balance PUR flooring have a resistant surface and are also very easy to look after. They are very quiet, pleasantly warm and, due to their low installation height and installation-friendly click geometry or whole-area gluing of vinyl made of solid material or vinyl for gluing are ideally suited for renovation work. These floor coverings are suitable for use in living and in commercial areas (in accordance with the wear classes of the respective product).

Wear class/exposure class

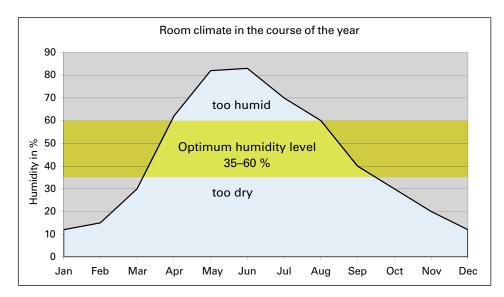
Features, requirements, and test methods are specified within the European standard for resilient flooring and are clearly and transparently illustrated across use classes. Depending on the achieved results – according to the requirements and intensity of exposure/use – of a floor covering, these classes are divided into residential area (number range 20) and commercial/public area (number range 30) and industrial area (number range 40).

Wear class	Pictogram	Intensity of exposure	Application (e.g.)	Wear class	Pictogram	Intensity of exposure	Application (e.g.)
Wear classe	s in the reside	ential area		Wear classe	s in the reside	ntial area	
21		moderate use	bedroom, storage room	41		moderate use	
22		normal use	living room, dining room	42		normal use	
22+		normal use	like 22 but more intensive use	43		heavy use	
23		heavy use	kitchen, hallway				
Wear classe	s in the comm	nercial area					
31		moderate use	hotel rooms, small offices			the technical data s	
32		normal use	offices, hotel lounges	download them at www.parador.eu. You will also find an overvi- the basic properties of the different Parador collections in the cu			
33		heavy use	classrooms, open-plan offices, boutiques	product catalogues.			
34		intensive use	like 33 with higher exposure				

Flooring and room climate

As long as the product has an HDF core board, the core board is a hygroscopic material. That means that the material can absorb moisture and release it again. On the one hand this can have a regulating effect on the room's climate, but it can also lead to the disadvantage that the material swells (gets bigger) when it absorbs moisture or shrinks (gets smaller) when it emits moisture. Whether it swells or shrinks depends directly on the indoor climate. If the climate is too dry, then hygroscopic material shrinks (here: HDF core board). If the indoor climate is too damp, then it swells. The HDF core board on resilient floor coverings also shrinks and swells. Particularly in the winter months, when the room humidity is often much too low (see illustration), the natural shrinkage of the material can lead to gaps forming. Conversely, when it is too damp, if the gap to the wall is not adequate or expansion joints are missing, the flooring area may start to bulge upwards.

In contrast, vinyl made of solid material – like all plastics – has the physical property of expanding with temperature changes, which must be taken into consideration with severe heat spots, e.g. in particular in case of sun exposure also in combination with floor to ceiling windows/doors. Humidity changes, which must be taken into consideration for hygroscopic materials, are irrelevant here.



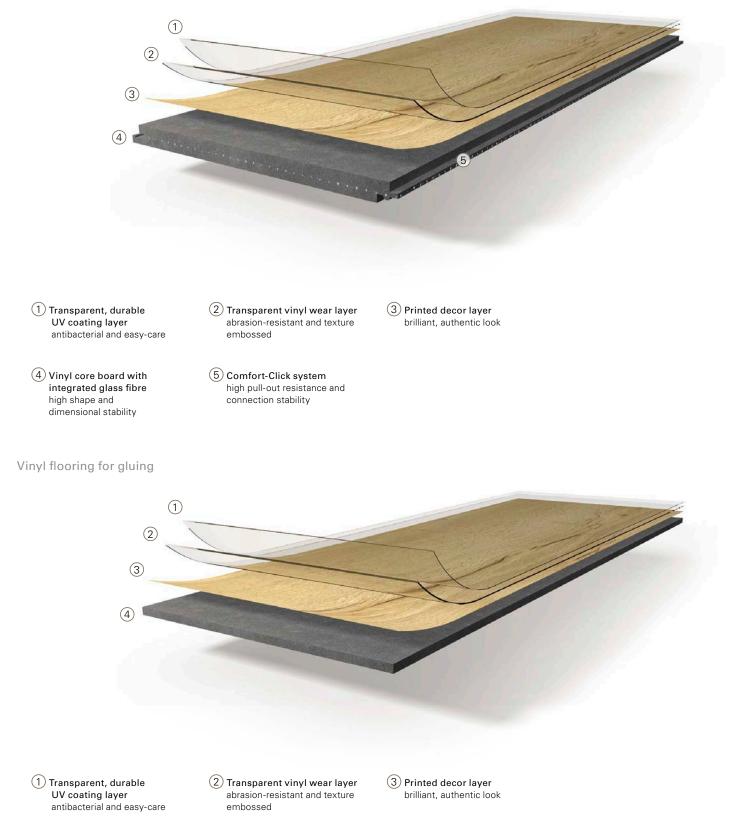
Please make sure not to exceed or fall below the ideal humidity figure shown in the diagram for a long time over the course of the year.

Product structure

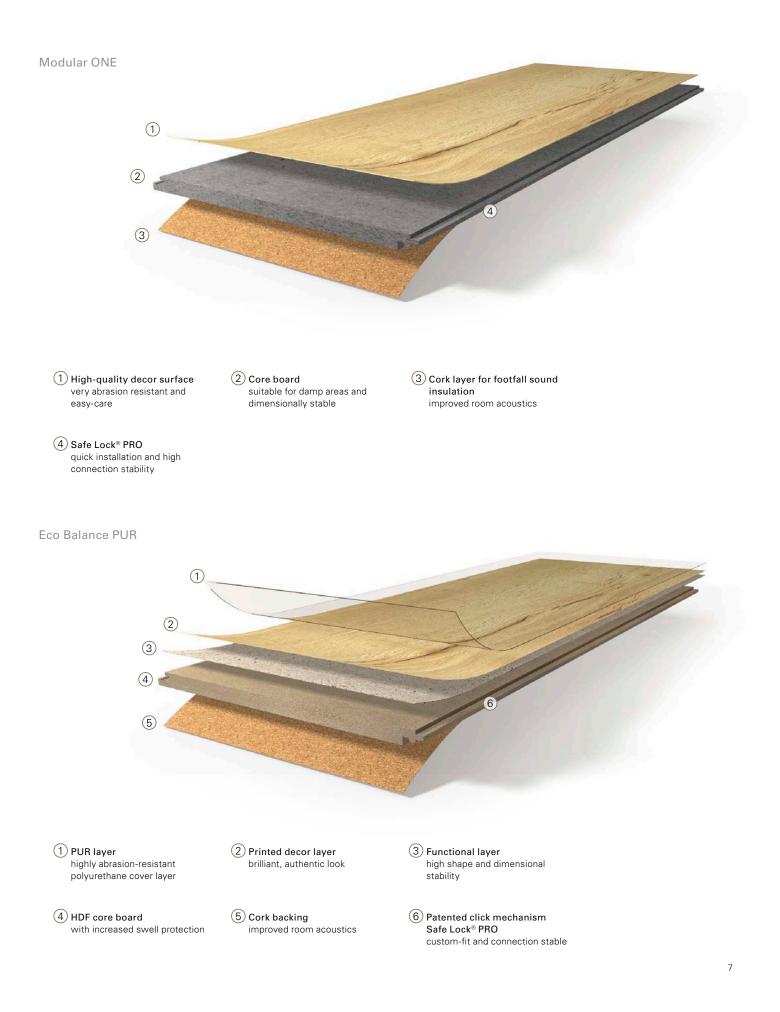
Vinyl flooring with an HDF core board



Vinyl flooring from solid material



(4) Stabilising vinyl core layer high shape and dimensional stability



Accessories

Underlays

Comprehensive information about underlays can be found in our catalogues and online under www.parador.eu.

When installing resilient floor coverings, we recommend using an underlay, as this compensates for slight uneven areas in the subfloor and has a positive effect on the floor's acoustics.

Vinyl flooring with HDF core board, Modular ONE, and Eco Balance PUR already have an integrated footfall sound insulation due to the cork layer on the back. Please note that the Parador PE film should be used even in cases in which the use of a PE film is not necessary for structural reasons and also appears unreasonable for creating a "smooth" installation surface. This ensures the uniform expansion property (unlimited "movement" of the flooring).

Akustik-Protect 100

- > integrated vapour barrier
- good impact noise and ambient noise insulation*
- > no additional moisture protection required (PE film)

Akustik-Protect 200

improved ambient noise insulation over Akustik-Protect 100

Akustik-Protect 300

- integrated vapour barrier
- even better characteristics than Akustik-Protect 100 and 200
-) an additional aluminium adhesive tape for sealing the joints
- > no additional moisture protection required (PE film)

Solid-Protect

- » specifically for floating installation of vinyl from solid material
- convenient folding underlay
- pressure-resistant polystyrene foam core

Stick-Protect

self-adhesive base for vinyl flooring for gluing
no gluing with screed (subfloor)

When installing on mineral subfloors, an additional form of moisture protection using a PE film is essential (exception: Akustik-Protect 100 and 300). In the case of subfloors and underlays made of wood-based materials (e.g. OSB or chipboard), using a PE film is also essential (risk of mould formation in the subfloor).

Attention: The underlays Plan-Protect, Uno-Protect, and Duo-Protect are unsuitable for vinyl made of solid material! Please only use the underlays from the Akustik-Protect range, Solid-Protect or Parador Stick-Protect for vinyl flooring for gluing.

Akustik-Protect 100



Akustik-Protect 200

Akustik-Protect 300



Solid-Protect

Stick-Protect



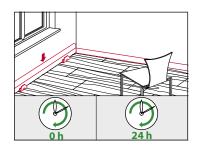
Skirting boards

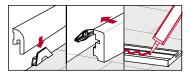
For a perfect finish, the Parador assortment includes the right decorative skirting board to match every floor design. It is attached to the wall with the Parador construction adhesive or the special plastic clips with integrated cable conduit. Caps and corners round off the assortment.

Skirting board assembly instructions

The flooring is ready to walk on immediately after floating installation (whole area gluing after max. 24 hours). Remove the Parador plastic spacer wedges and attach the Parador skirting board using the patented clip technology or Parador construction adhesive.

Note: For floating installation, the skirting boards must not be glued or sealed to the resilient floor covering!



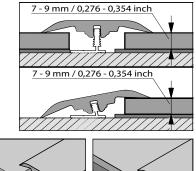


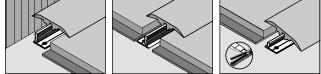
Profiles

Parador profiles are suited for finishing, transitions, and adjustments. The basic profiles are screwed onto the subfloor or – in particular with an underfloor heating system – are glued to the subfloor. Insert cover profiles or screw down aluminium profiles –done.

3-in-1 HDF profile vinyl flooring

- > identical texture and decor
- >48 mm width
- installation height approx. 3.5 mm
- » area of use for flooring: thickness 7 to 9 mm



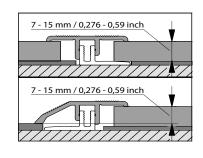


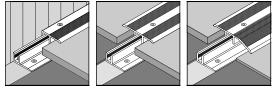
Note: When using as a transition profile, only an adjustment of the base profile is necessary. In certain cases, when using it as an end profile, depending on exposure, underpinning may be adviseable.

Aluminium profiles

Aluminium profiles are suited for a use with floor coverings with a thickness of 7 to up to 15 mm.

Please note the following cover dimensions:Transition profile:34 mmEnd profile:22 mmAdapting profile:44 mm





Tool

You will need the following tools and aids for installing Parador resilient floor coverings and accessory products:

Tape measure or hinged ruler, cutter knife, pencil, handsaw, Parador plastic spacer wedges, Parador MultiTool, Parador vinyl installation aid, hammer, drill and jigsaw, crosscut saw, or circular saw.

Other tools and materials may be required, depending on the application: Vinyl for gluing: spatula to apply glue (spatula size A1 – A2); Pressure roller (approx. 50 kg); "gun" for installation glue; Metal saw for aluminium profiles

Basic rules for installation

These installation rules and the assembly process shown below are generally applicable. Other special or different rules and instructions, which are advisable and mandatory, may be listed in the pack leaflets inserted with the relevant products.

Video installation - Parador vinyl flooring with HDF core board:







Inspect planks for material defects

The planks should be checked thoroughly for material defects before and during installation (Figure 1). Claims cannot be made on installed goods. Planks with visible defects or damage must not be installed. Assembly should only take place under daylight or with adequate lighting, as otherwise any damage or faulty planks cannot be detected in some circumstances.

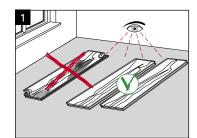
Acclimatisation before installation

The flooring elements must be acclimatised over a period of at least 48 hours at a room temperature of at least 17 °C and a relative humidity of 35–60 % in the room where they are being installed. (Figure 2). That means that the sealed packages must adjust to the climate conditions in the room. If there are major climate differences between the storage and installation area, the acclimatisation period should be extended. If the climate conditions are almost the same, the period can also be shorter. Please store the packages flat on an even base without opening them. It is essential that you comply with these points, especially in new builds where the humidity is usually very high. It also makes sense to store the packages on storage timbers or a pallet. In any case, please take care that the flooring elements lay flat and do not bend.

	Expansion joints / wall clearance (mm)	Installation in spray water areas ^{1.)}	Floating installation	Full-surface gluing	Underfloor heating (hot water/electrical)
Vinyl flooring with HDF core board	8	Yes with safety clearance	Yes	No	
Vinyl flooring from solid material	5	Yes	Yes (see notes: e.g. wall to ceiling windows)	SikaBond 130 Design Floor	
Modular ONE	8 (10 ^{2.)})	Yes, standing water max. 4 hours	Yes	No	Yes/see notes: Installation options Item 3
Eco Balance PUR	8	Yes with safety clearance	Yes	No	
Vinyl flooring for gluing	3	Yes	With Parador Stick-Protect	SikaBond 130 Design Floor or Parador Stick Protect	

^{1.)} Standing water in the profile and skirting area is not permitted

^{2.)} See installation options- location of expansion joints: room size greater than 8 x 12 m





Maintain expansion joints/wall clearance

The core board used for vinyl with an HDF core board and for Eco Balance PUR as well as the special Modular ONE core board is a wood-based product, which, like natural wood, is also subject to swelling or shrinking depending on climate conditions. Heavy components i.e. kitchen units and other fixed components such as walls and radiators etc. should not be placed on top of these type of floor-coverings. It is essential to leave the recommended wall clearance or expansion gap. Furthermore, equally sized expansion joints must be maintained when a defined installation area is exceeded. Too small a wall clearance is the most common installation error. This often only becomes noticeable in summer, as the increased humidity and temperature in the summer months makes the flooring expand. The expansion joint or wall clearance should be at least 8 mm* for vinyl with HDF core board, Eco Balance PUR, and also Modular ONE (special core board (Figure 3), more on larger areas (see Section: Location of expansion joints: room size greater than 8 x 12 m).

The rule of thumb is: per metre of flooring keep at least a 1.5 mm expansion joint at both sides of the room. (example: room width $5 \text{ m} = \min .8 \text{ mm}$ wall clearance per side)

Expansion joints or wall clearances should also be maintained with vinyl made of solid material. These should be at least 5 mm (Figure 4), and the same for vinyl for gluing, but here at least 3 mm.

Even if the installed material only abuts a single point in the room, the floating material may start to push up and warp. Frequent weak points in this case are door frames, joints to stairs, radiators and end rails. If heavy objects over 350 kg such as kitchen and cabinets are installed over these floor-coverings and the floorcovering can only move freely on one side, it is necessary to ensure that the wall clearance opposite is left twice as large as normal. We recommend assembling heavy objects and fitted furniture (kitchens, fitted units, aquariums etc.) before the floor-covering installation and only installing the flooring just underneath the base (Figure 5). This makes it easy to take the flooring back up at any time. The edge clearance all around is covered by skirting boards at the walls and in other areas by special floor profiles. It may be reasonable to include the position of heavy objects already in the installation planning (tip: avoid open joints by gluing the ends in the stress areas).

*Note: min. 15 mm at a relative humidity of >60 %

Position of expansion joints: room size smaller than 8 x 12 m

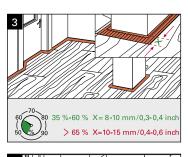
As resilient flooring will swell or shrink depending on climate conditions, further expansion joints and movement joints of at least 8 mm (for vinyl with HDF core board and Eco Balance PUR), at least 5 mm (for vinyl made of solid material) (Figure 6), and at least 3 mm for vinyl for gluing are necessary under the following conditions:

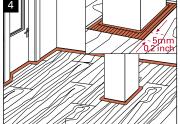
- larger installation lengths and widths (over 8 x 12 m room width or 12 m in length)
- irregular shaped areas
- installation from room to room in door passages

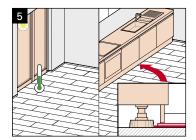
Note regarding Modular ONE:

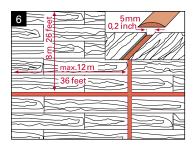
A room transition without expansion joint is possible if all rooms have the same room climate. In areas with a variety of conditions, e.g. due to a fireplace, convectors, conservatories (floor to ceiling windows), large overhead glazing, or differently designed and functioning heating circuits (floor heating/wall heating), corresponding expansion joints must be provided for. Continuous room transitions are not permitted if heavy static floor loads exist in some areas.

These expansion joints are covered with appropriate expansion joint profiles (see Section: Accessories).









Position of expansion joints: room size greater than 8 x 12 m

Starting at a room size of 8×12 m, expansion joints must be provided in addition to the above stated requirements. When using Modular ONE, expansion joints are necessary only starting at a room size of 12×20 m. Here, it must however be noted that the expansion of movement joint clearance must be increased to at least 10 mm. In such applications, please note the following: Static load on floor surface and attachments.

Note: The installer is always liable if expansion or movement joints are omitted.

Installation pattern

Flooring elements can either be laid in a regular or random fashion (Figure 7). In each case, care should be taken that the head joints are offset from row to row by at least 40 cm (half the length for tile format) (Figure 8).

Installation direction (incidence of light and room floor plan)

For optical reasons, the planks should be laid parallel to the incidence of light (away from the incidence of light), i.e. the long side runs in the same direction as the light entering the room (Figure 9). If there is more than one window, please go by the largest window. If the floor plan of the rooms is very unusual, the direction of installation should also be judged according to how the room is divided. For optical reasons, the long sides of the floor should be at right angles to the long side of the room. This makes the room appear squarer and bigger instead of long and "tube-like".

Installation in damp areas

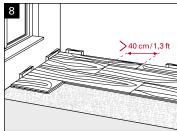
Vinyl made of solid material and vinyl made for gluing are suitable for installation in damp areas (Figure 10). We recommend whole area gluing (a suitable glue is available in the Parador product range). Care should also be taken that standing water is quickly removed. The edges should be sealed, for example with silicone if gluing the whole area. In case of floating floors, a "sealing" using for example silicone will not create a reliable attachment of the flooring, which can or will create difficulties for the suitability for everyday use of the floor (swelling and shrinkage). Solutions for such cases are available on the market, e.g. sealing profiles with flexible sealing lips.

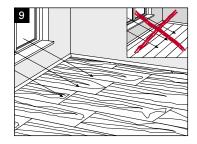
Vinyl with HDF core board and Eco Balance PUR must not be installed in areas where water can lodge on the floor (Figure 12). Standing water penetrates the HDF core board via the edges and causes permanent damage. Modular ONE's special core board and waterproof surface allows the use of this flooring in damp rooms with up to four hours protection from standing water. (Figure 11).

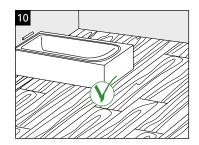
In permanently wet rooms and environments, we recommend the use of the water-resistant skirting boards from the Parador product range.

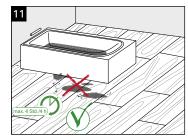
Note: The installation of resilient flooring in showers is not permitted (temperature effects).

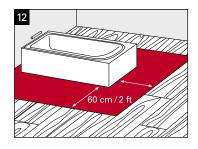












The formation of puddles and the effects of damp must be prevented at all costs at the edges and in the joint areas as well as on the surface. Water penetrating underneath the flooring may cause the formation of mould (Figure 13).

Subfloor requirements

¹ the basic requirement for laying resilient floor coverings is a firm, clean, dry and even subfloor.

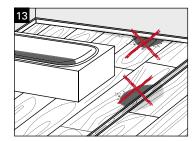
- uneven areas of more than 3 mm across 1 m (Figure 14) must be evened out with a suitable filler (1mm across 1 m for vinyl made of solid material) (also see the special requirements in the Section substrate conditions for vinyl for gluing).
- When installing resilient flooring with HDF core boards or special core board on old wood planks and particle boards, loose planks must be screwed to the substructure to reduce any creaking. The flooring should be laid at right angles to the lengthways direction of the wood planks. It is not recommended to install vinyl made of solid material here.
- For reasons of strength and from a hygienic point of view, carpets are not suitable as a subfloor and must be removed (Figure 15).
- ⁹ We only recommend an installation on older PVC, CV or linoleum coverings if the flooring is glued in place, have no loose areas and there is no underfloor heating. A suitable underlay must be installed to compensate for uneven areas.
- When installing on tiled floors, please bear in mind the required evenness of the subfloor. If the height differences in the joint area are small enough, a resilient flooring with HDF core board or special core board can be installed combined with an underlay from the Akustik-Protect range. We generally recommend levelling out the tiled floor with a suitable filler. This method should be selected particularly when installing vinyl made of solid material, otherwise the joints of the tiled floor may push through the solid material. Although this does not have a technical impact on the floor in case of just slight uneven areas, it can have an impact on its look.
- > Screeds must not exceed the following moisture level:

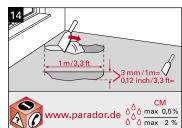
	Anhydrite screed	Cement screed
without underfloor booting	$max 0 \in CM \%$	may 20 CM %

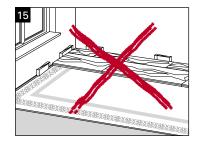
without undernoor heating	max. 0.5 CIVI %	max. 2.0 CIVI %
with underfloor heating	max. 0.3 CM %	max. 1.8 CM %

Generally speaking, the screed moisture must be checked using a suitable test measuring device. With a flowing screed, please keep to the manufacturer's specifications about drying time.

For a resilient flooring with HDF core board or special core board, with mineral substrates,* as a precautionary measure a 0.2 mm thick PE film must be placed underneath as a moisture barrier (Figure 16) (allow strips to overlap by at least 30 cm, apply adhesive tape, allow to protrude at the edges to form a trough and cut off the excess with a knife after attaching the skirting board). Or you can use Parador underlays with impact noise insulation and integrated moisture protection (Akustik-Protect 100 and 300). If moisture keeps on rising from the subfloor, please seal the floor area with a suitable liquid sealer.









Installation options

Floating installation

If the resilient floor covering is installed without a fixed connection with the substrate, i.e. only the planks are joined to one another, we call that "floating installation". Thanks to simple click technology, Parador flooring is suitable for floating installation. This installation type is the most popular installation method.

Full-surface gluing

Vinyl for gluing is designed for this type of installation. In special cases (e.g. at the request of the user) it may be necessary to completely glue other floors, although in principle the flooring elements are designed for a floating installation. Vinyl made of solid material needs to be completely glued e.g. on continuous areas of 10 x 10 m as well as in bathrooms (for hygiene – not technical reasons) and in areas with strong sun- shine, such as conservatories, shop windows, large window areas and in areas where an indoor air temperature of 18–30 °C or an underlay temperature of min. 15 °C cannot be permanently guaranteed.

For this purpose, please see the chapter "Gluing the whole area". Vinyl flooring with HDF core board, Eco Balance PUR, and Modular ONE are not suitable for gluing over the whole area.

Installation on underfloor heating

Parador Vinyl flooring, Eco Balance PUR, and Modular ONE are suitable for floating installation on hot water underfloor heating systems.

Vinyl flooring made of solid material should be glued on the whole area when using on underfloor heating, in areas with severe sun exposure, and in areas with floor to ceiling windows.

Vinyl flooring for gluing can be used on underfloor heating.

Please note the following for installation on electronic underfloor heating systems:

- installation only with systems that have temperature sensors and controllers
- no installation on older design electric underfloor heating systems (installed before 2000)
- > no installation on night storage heaters

On the technical data sheets you will find further information, for example about the heat transmission resistances of our resilient floor coverings.

The maximum surface temperature of 29 °C should not be exceeded and a very fast heating process must be avoided.

Use of floor cooling

According to prevalent expert opinions, cooling a room by maximum 5 °C is easily possible at a maximum relative humidity of 65 %. According to the workplace directive, the lower floor temperature limit of 19 °C should also be maintained in "normal" housing. People are more prone to ill health in areas with cold floors. The Parador floor coverings can be used without restrictions if these specified conditions and the installation and fitting instructions are complied with.

Assembly

Preparation and centring

Once you have taken note of the basic rules and the underlay is installed, it is possible to start with the actual installation of the resilient floor covering.

In order to achieve an even appearance of the first and last row, measure the width of the room at right angles to the direction of installation and work out the width of the first and last row of planks (in each case at least ½ plank width) (Figure 1).

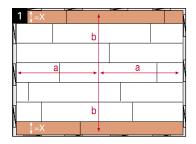
Install elements mixed from at least three packs so that you get an even decorative appearance across the area.

The last element of each row is cut to length and the remaining piece, which should not be shorter than 20 cm, is used to start the next row.

The cross joints should be offset from row to row by at least 40 cm (half the plank length with tile format) ("random bond").

Please bear in mind when gluing the whole area that any expansion joints (so-called construction joints) in the subfloor must also be adopted in the top layer.

Please check each plank in daylight or adequate lighting for defects before installation and only lay planks that are in perfect condition.



Assembly vinyl flooring with HDF core board, Modular ONE, and Eco Balance PUR

For assembly purposes, please also take note of the instructions on the pack leaflet in particular. Also see the Section Basic installation rules. The Parador installation video vinyl flooring with HDF core board (QR code and internet link) is available in this section.

If the wall is not straight, adopt the contours of the wall e.g. with the Parador MultiTool and trim the first row of planks accordingly (Figure 2).

The first row of planks is laid so that the groove of the end side and the long side (former tongue side) face the wall (Figure 3).

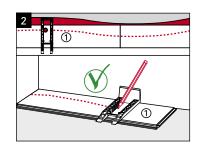
Start in the left-hand corner of the room. The required wall clearance is at least 8 mm and is achieved using the Parador plastic spacer wedges.

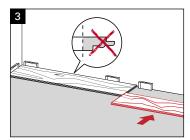
Start by pushing together the end joints of the first row of planks. Align the long sides of the planks.

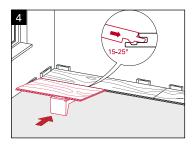
Please insert the first plank of each subsequent row diagonally into the long edge of the installed row (angle 15–25°) and position the Parador MultiTool (Figure 4).

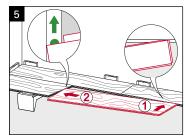
To install the subsequent planks, please proceed as follows:

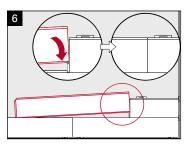
- Place tongue on the end side into the groove on the long side
- Place groove on the end side up to the level of the black dot on the tongue on the end side (Figure 5)
- > Pull/push plank up to the installed row in one movement (Figure 6)
- Check whether all joints are closed (Figure 7)
- The continuous use of the Parador MultiTool ensures an optimal angle setting

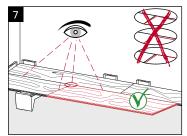












Alternatively, from the second row onwards you can use the following installation technique:

- push the plank on the floor up to the first row
- > tilt the plank slightly (15–25°) up to the click-in point (Figure 8)
- the plank clicks in when lowered, resulting in a tight fit with no play
- set in place, i.e. by hitting with a hammering block (Figure 9 and 10)
- after measuring and cutting the piece on the end of the row to length, this is inserted carefully (bear wall clearance in mind) (Figure 11)

If you are using a jigsaw to cut the elements, it is best to guide the saw along the bottom of the plank. If using a bench saw, place the plank on the bench with the decor side facing up. In this way you will get the best quality cut (Figure 12).

If, when fitting the piece on the end of the row, it is no longer possible to place it at the level of the green dot, push this end piece on the tongue of the end edge into the long edge (Figure 13), remove the Parador MultiTool and lock the long edge in place (Figure 14). Check that all joints are closed and use the Parador MultiTool as a hammering block if necessary (Figure 15).

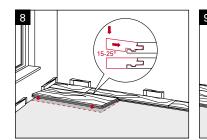
Cut the last row of planks to the required size by using e.g. the Parador MultiTool or a leftover piece of plank to transfer the width. Please also bear in mind the required wall clearance of at least 8 mm in doing so.

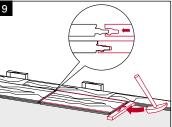
The floor is ready to walk on as soon as it has been installed. You must only remove the Parador plastic spacer wedges and attach the Parador skirting board using the clip technology or Parador construction adhesive.

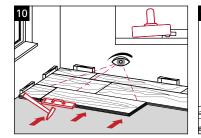
Dismantling tips for vinyl flooring with HDF core board, Modular ONE, and Eco Balance PUR

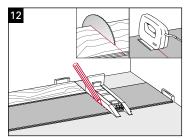
To take up the planks without damaging them, proceed as follows:

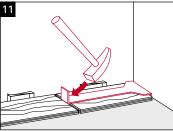
The complete row of planks is lifted on the groove side past the click-in point and pulled away in one piece. After that, lay the row of planks back on the floor. The end joints are not undone by pulling longways, but by pushing the planks crossways (Figure 16).

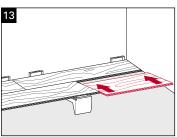


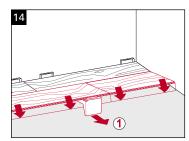


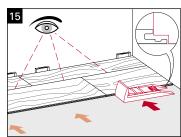


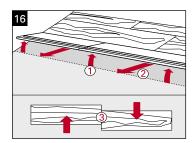












Assembly of vinyl flooring from solid material

For assembly purposes, please also take note of the instructions on the pack leaflet in particular. Also see the Section Basic installation rules (page 11). The Parador installation video vinyl flooring made of solid material – also for using the vinyl installation aid – (QR code and internet link) is available in this section. A Parador installation video for vinyl flooring made of solid material (large format) is available on the Internet.

The first row of planks is installed so that the tongues of the end and long sides face the wall. Start in the left-hand corner of the room. The required wall clearance is at least 5 mm and is achieved using the Parador plastic spacer wedges. If the wall is not straight, adopt the contours of the wall and trim the first row of planks accordingly (Figure 1). Start by joining together the end joints of the first row of planks. Align the long sides of the planks (Figure 2).

Please measure the end piece of a row of planks accordingly with a square and use a craft knife to score the decor surface bearing in mind the required wall clearance (Figure 3). The plank can now be simply broken over an edge along the cut.

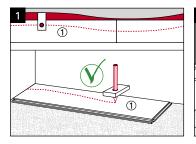
The first plank of the second row is then joined on the long side as follows

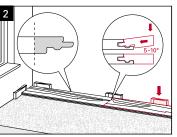
- push the plank on the floor up to the first row
- > tilt the plank slightly (5–10°) up to the click-in point. (Figure 4a and 4b).
- the plank clicks in when lowered, resulting in a tight fit with no play.
- set in place, i.e. by hitting with a hammering block, Parador vinyl installation aid, or Parador MultiTool
- > position the vinyl installation aid (Figure 4a) or when using large format vinyl planks made of solid material a strip (approx. height 6 cm) (Figure 4b) – under the installed plank (Figure 5 (1)). This already defines the optimum angle for the long edge.

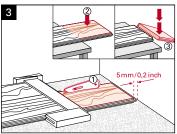
Insert the end edge at an angle of 5–10° (Figure 5 (2 and 3).

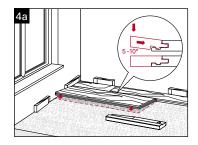
Important: When clicking in planks on the end side, make sure that the gap to the long side of the previous row of planks is as small as possible.

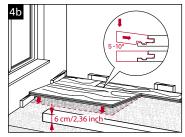
Then tilt the planks slightly on the long side (5–10°) and at the same time push towards the long edge of the previous row of planks (Figure 6).

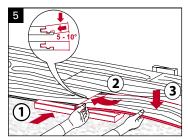


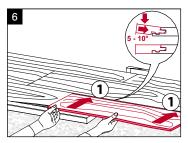












Pull the vinyl installation aid out (Figure 7) and position it or, when using large format vinyl planks made of solid material, a strip to install the following plank. It, like all the rest, is then clicked in place in the same way on the end side

Make sure that the planks fit flush and are actually clicked in (Figure 8).

Use a hammering block, the Parador vinyl installation aid, or the Parador MultiTool to lock the end and long edge for good (set in place) (Figure 9).

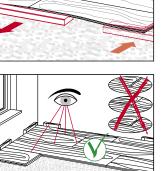
Cut the last row of planks to the required size by using a leftover piece of plank to transfer the width. Please also bear in mind the required wall clearance of 5 mm.

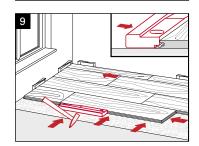
The floor is ready to walk on as soon as it has been installed. You must only remove the plastic spacer wedges and attach the Parador skirting board using the clip technology or Parador construction adhesive.

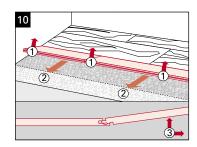
Dismantling tips for vinyl made of solid material

To take up the planks without damaging them, proceed as follows:

The row of planks is lifted on the long side of the individual plank past the click-in point and pulled back a few millimetres. The end edge joint is then unlocked in the same way (Figure 10).







Vinyl flooring for gluing

Subfloor preparation

The installation of Parador vinyl for gluing requires an even and absorbent subfloor. Usually, screed is not installed with the necessary evenness (1 mm per metre). We recommend applying a levelling compound at a thickness of at least 2 mm over the complete area to create an optimum subfloor for installation.

An adhesive agent/sealant may be required depending on the floor substance (screed may contain substances that affect the adhesive properties of the levelling compound negatively, highly absorbent screed, rising moisture, etc.). Please review compatibility/effects of the used materials with the relevant manufacturer's information. After preparation, the commercially available levelling compound is poured on the subfloor in a liquid state and distributed or spread with a blade or spiked roller.

Please note the manufacturer's information concerning the adhesive agents and sealants, in particular with regard to the edges (use of an edge sealing strip (clearance – levelling compound/wall, sand down existing levelling compounds, ventilation periods, etc.).



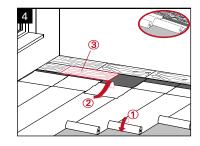
For whole area gluing of Parador vinyl for gluing on the subfloor, Parador recommends a solvent-free, high-quality dispersion adhesive from the Parador product range (SikaBond 130 Design Floor: trowel size: TKB A1 (Figure 3) - A2; Parador recommendation: trowel size TKB B2 insofar as even subfloors (1 mm across 1 m) cannot be levelled/smoothed (consider higher absorption/porosity of older subfloors).

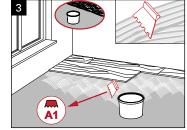
Avoid soiling the floor surface with glue residue. If necessary, remove fresh glue residue from the floor surface and/or e.g. hands using the hand cleansing wipes from the Parador product range.

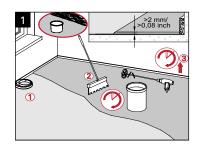
Gluing with self-adhesive underlay (Parador Stick-Protect)

Roll out the self-adhesive underlay at a right angle to the direction of installation; do not overlap; the covered adhesive side must face up (Figure 4 (1)). Remove enough of the cover film to install/position the first row (Figure 4 (2)). Proceed in this way for the rest of the installation.







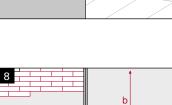


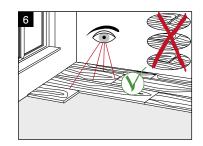
Please measure the end piece of a row of planks accordingly with a square and use a craft knife to score the decor surface bearing in mind the required wall clearance (Figure 16). The plank can now be simply broken over an edge along the cut (Figure 5).

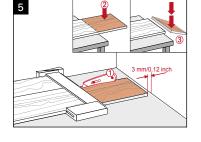
Note: Please precisely check the position (long and short edge, parallelism, perpendicularity) of planks without click geometry during installation (Figure 6).

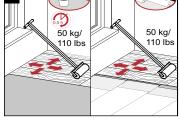
Removal and possible repositioning is possible shortly after installation. Generally, the plank elements must be pressed properly down into the adhesive. Rolling with a pressure roller (weight 50 kg) is necessary for whole area gluing with the subfloor as well as for installation on the self-adhesive underlay (Figure 7). The adhesive has dried completely after approximately 24 hours – in case of Parador Stick-Protect directly after rolling.

Note: depending on the room situation, it might be reasonable to start installation in the centre of the room (Figure 8). In this case, please install the self-adhesive flooring in the complete room (as described above) and separate the cover film using a craft knife in order to expose the adhesive layer and use Parador vinyl for gluing.









Tips

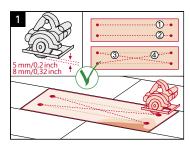
Replacing a damaged plank (for floating installation)

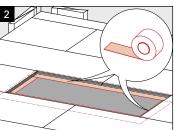
In the event of a damaged plank in the middle of a room, it is possible for you to replace this with some handicraft skill. To do so, please use a saw cut right through the damaged plank (Figure 1) and remove the damaged plank. Use the plank height of your installed resilient floor covering as guidance.

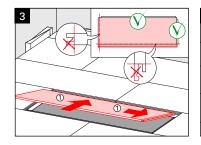
Apply adhesive tape along the cut edge (Figure 2). To do so, please slightly lift the installed area and place a wide adhesive strip with the sticky side facing up half way under the installed area. Remove the parts of the click geometry highlighted in Figure 3 from a new, undamaged plank.

Now insert the adjusted piece of plank into the gap from above and press the planks firmly around the edges onto the adhesive tape. You can achieve additional stability by applying plastic adhesive to the edge beforehand.

Place a weight onto the replaced plank so that it lies flush with the adjacent planks. Place the weight beyond the plank area (Figure 1).







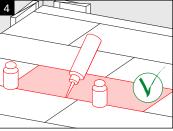
Shorten a door frame

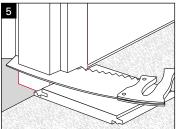
Lay a leftover piece of plank incl. underlay with the decor side facing down against the frame and saw it off along the plank as shown (Figure 5).

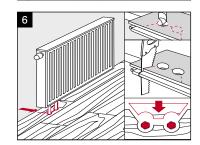
Pipe holes

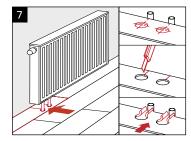
Make the diameter of the pipe holes 10 mm bigger than the pipe (play/movement joint). Mark the holes, drill out, and saw off at an angle of 45° as shown (in case of vinyl with HDF core board, Modular ONE, and Eco Balance PUR). Glue the sawn out piece in place. Do not forget the wall clearance here (Figure 6).

In case of vinyl made of solid material and vinyl for gluing, it is sufficient to drill the pipe hole as described above and to cut from the hole to the edge of the plank with a craft knife. You can then bend the plank apart, place it around the pipe and bend it back (Figure 7).









Retain value

General information

General information on retaining the value of your resilient flooring:

- 35–60 % relative humidity is ideal for resilient floor coverings and also recommended for people's well-being.
- > avoid sand and dirt as both act like sandpaper.
- immediately wipe up liquids resting on the floor.
- > only wipe with a slightly damp cloth
- > do not use any abrasives, floor wax, steam cleaners, or polishes. Among other things, they tarnish the floor's appearance.
- avoid strong sunlight. Use a suitable light shield if necessary.
- > do not use steam cleaners.
- please use care and routine care products from the Parador product range.

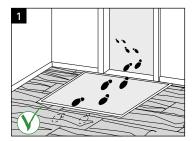
Avoid damages

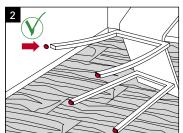
As with all other floor coverings, you should protect your new resilient flooring from dirt particles by using suitable dirt-trapping zones (mats) (Figure 1).

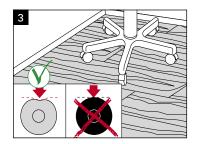
When using such mats, make sure they have a non-colouring rubber or latex backing. To protect the floors from scratches, suitable soft felt pads (light-coloured ones if possible) must always be fitted under chair and table legs and under pieces of furniture (Figure 2).

Rollers on office chairs, file trolleys and roller containers should be fitted with soft treads/rollers (type W, EN 12529) (Figure 3). In these heavily used areas, you can also protect the floor using suitable floor mats (available in office supplies stores). Avoid using tyres or protective covers made of black rubber, as these may lead to discolouration.

We recommend that you clean your resilient floor covering regularly with a vacuum cleaner (attached brushes) or broom. Cleaning with a slightly damp cloth should only be done in case of stubborn dirt. It is important in this case that the cloth is well wrung out and that no puddles form with standing water.







Final construction cleaning

Remove drilling dust and loose particles with a broom or vacuum cleaner. To finish, wipe damp with a suitable cleaner (wring cloth out well and avoid puddles of standing water). The proper cleaners are available in Parador's accessories range.

Initial treatment

Generally, an initial treatment of the floor is not necessary, and in the case of Modular ONE and Eco Balance PUR it is not possible. If, however, you want to carry out an initial treatment after cleaning at the end of installation of your vinyl flooring, a polymer dispersion can be used for a simple treatment, or you can seal it with PU sealant for a high quality treatment. Please note the corresponding gloss level of the care product and its other application instructions. For this we recommend the Design Floor care set from the Parador product range.

Additional/subsequent seal of vinyl flooring (whole area)

You can change the properties of your Parador vinyl flooring and enhance it by giving it an additional seal. In some cases it may make sense (e.g. in doctors' surgeries and hair salons) to apply additional protection against damage or to increase the anti-slip class. This can easily be done with the aid of a PU sealant. You can also renovate or repair your floor covering with a subsequent seal if there is damage caused by scratches or differences in gloss level. Suitable PU sealants are available in Parador's accessories range. Please take note of the respective application instructions and labels provided by the supplier, as well as the technical information for retaining the value of resilient floor coverings.

Routine cleaning

Dust, fluff and loose particles can be removed with a broom or vacuum cleaner (attached brushes). Dirty marks are wiped off with a damp cloth. Floor cleaners, neutral and intensive cleaners make suitable cleaning products. Please do not use any alkaline cleaners or those that contain solvents or glycerine. You will find special cleaners in the Parador product range. In case of stubborn dirt, wipe the floor damp with a PU cleaner. Make sure that no puddles of water form.

Stubborn dirt

Dirty marks caused by substances like shoe cream, varnish, tar, oil, grease, ink and lipstick are best removed using a cloth soaked in PU cleaner. In this respect, the relevant instructions of use should be observed. Please bear in mind that some skin disinfectants and wound care products may leave stains that cannot be removed. In such cases, a seal over the whole area of your vinyl flooring is recommended as a preventive measure (see above).

Stain removal and levelling slight scratches

Apply some PU cleaner with a cloth to the area being treated and rub it dry after a few minutes. Repeat this process if necessary. To finish with, wipe with a damp cloth. Transparent acrylic touch-up sticks or a subsequent seal over the whole area are also suitable (for vinyl flooring). When applying the care product, always keep to the instructions on the packaging.

Frequently asked questions

1. Can I lay resilient floor coverings on existing tiles?

In principle, a tile subfloor is suitable for installing resilient floor coverings. Please remember to lay down a 0.2 mm thick PE film. The tile floor must be even and must not have any protruding tile corners. Otherwise a suitable underlay must be used or the tile area filled. When installing vinyl made of solid material, the tile subfloor is to be levelled with a suitable filler Please observe the notes about this topic in the chapter "Basic rules for installation".

2. Are resilient floor coverings harmful to health?

No. Due to their soft structure, standing and walking on resilient floor coverings is particularly kind to the joints. Only harmless raw materials are used in Parador resilient floors meaning that there is no risk to your health or the environment. Not only do we ensure the high quality of Parador floors through external and internal tests, but we also have ourselves checked and monitored by renowned institutes. We prove this with the numerous certifications issued for our products, which are listed in the data sheets (available at www.parador.eu).

3. How do I clean a resilient floor covering?

For normal maintenance care, a standard floor or universal cleaner is best suited. For further information please read the chapter "Value retention". You will find special cleaners in the Parador product range.

4. What are the benefits of a resilient floor covering?

Resilient floor coverings are particularly long-lasting, robust and easy-care floor coverings, which can be barely distinguished from real wood or stone in terms of look and feel. Due to their soft surface they make a very pleasant sound indoors and thus provide an enhanced feeling of comfort in the home. Additional product advantages are listed in our catalogues and at www.parador.eu.

5. How do I renovate a resilient floor covering?

Vinyl flooring is renovated by subsequently sealing the whole area of the floor with a special PU sealant (available in the Parador product range). You can find further information in the chapter "Value retention".

6. Can I install resilient floor coverings in the bathroom?

Installing vinyl made of solid material in the bathroom is possible. We recommend whole area gluing and the use of water-resistant skirting boards. Installation of Modular ONE in damp areas is also possible with up to four hours of protection in the case of standing water. The humidity tends to be too high for using vinyl with HDF core board or Eco Balance PUR in damp areas and the risk of the core board swelling from splashing water is too high. You can find further information in the chapter "Basic rules for installation".

7. Do heavy objects cause pressure points in resilient floor coverings?

The pressure and period of exposure are critical for pressure points developing. Very heavy furniture with a very small contact area, which is left in place for a long period, will leave pressure points behind on resilient floor coverings just as much as on other soft floor coverings. Increasing the contact area by placing something suitable underneath can effectively reduce this effect.

8. Can I install resilient floor coverings outdoors?

Parador products are indoor products. They are not suited for outdoor installation.

9. Can I install resilient flooring in rooms with large windows (floor to ceiling windows) or in a conservatory with strong sunshine?

For a floating installation, Parador recommends using vinyl with HDF core board, Modular ONE, and Eco Balance PUR for the above-mentioned areas. Due to the product composition, this product reacts less to temperature fluctuations than vinyl made of solid material.

If the installation of vinyl made of solid material or vinyl for gluing is preferred or necessary due to its suitability for damp areas, the floor needs to be glued over the whole area.

The light fastness of the resilient flooring has been tested according to test standard EN ISO 105-B02 and achieves at least level 6 (or higher) on the blue wool scale. Nevertheless, colour changes cannot be ruled out if continually exposed to high levels of sunshine.

Strong sunshine can lead to small joints appearing on the plank transitions.

In all cases, it is important that typical indoor temperatures persist all year round in the installation area.

Parador recommends heating the areas in question during winter and protecting them in summer from direct sunshine by taking appropriate precautions (e.g. roller blinds or shutters).

If the recommendations and conditions are not complied with, any guarantee or warranty claims are excluded on the part of Parador.

Check list for whole area gluing

The resilient floors made by Parador are designed for floating installation. On request or even advisable or necessary in certain situations (e.g. in conservatories or bathrooms), vinyl made of solid material can also be glued over the whole area. Vinyl with HDF core board, Modular ONE, and Eco Balance PUR are not suitable for gluing over the whole area!

Please observe the following tips:

- ³ as a surface area adhesive, only water and solvent-free, one or bi-component (1-C or 2-C) polyurethane adhesives recommended for this purpose by the adhesive manufacturer, or solvent-based adhesives in accordance with DIN 281, should be used. The adhesive manufacturer's specifications, particularly with regard to applying the adhesive, ventilation time, rolling, etc., must be observed.
- ³ with vinyl made of solid material, as a matter of principle, a wet bed gluing process (wet adhesion) is preferable to pressure-sensitive (semi-wet stage). Toothed spatula A2 is prescribed. For vinyl made of solid material, Parador recommends the solvent-free dispersion adhesive Sika Bond-130 Design Floor. (SikaBond-130 Design Floor is only designed for processing by professional users.) If you have special questions, please contact the adhesive manufacturer and be guided by the relevant technical leaflet.
- ⁵ the subfloor must be clean, dry, load-bearing, even and free of layers that reduce adhesion such as oil, dust and loose particles. Cement laitance, paint and other layers that reduce adhesion must be removed. Concrete and/or screeds must be sanded and vacuumed with an industrial vacuum cleaner. The usual rules of construction must be observed. The subfloor must meet the requirements of the applicable standards such as DIN 18 365 and DIN 18 202. In order to achieve a sufficiently absorbent and even subfloor, a cement-based filler (e.g. Sika R Level 300 Extra) is to be applied in a thickness of at least 2 mm. If installation is expected to take place on subfloors with underfloor heating, please check whether the measuring points are marked. The room temperature must be >18 °C, the temperature of the subfloor, floor covering and adhesive >15°C. Ideally, care should be taken that the relative humidity is 40 60 %. As already mentioned, the pre-treatment is also done according to the adhesive manufacturer's specifications.

> screeds must not exceed the following moisture level:

	Anhydrite screed	Cement screed
without underfloor heating	max. 0.5 CM %	max. 2.0 CM %
with underfloor heating	max. 0.3 CM %	max. 1.8 CM %

- [•] depending on the product, an appropriate minimum gap must be maintained to all fixed objects (see notes about this in the advice section).
- [•] the general notes from the assembly instructions should also be observed when gluing the whole area. In particular, the planks must be acclimatised in the installation rooms.
- you can find further information on the adhesive manufacturer's website (e.g. www.sika.de) or contact the Parador application technology department in case of doubt.

Acceptance protocol for trade

(sample)

 Mr. / Mrs.:
 Order number:

 Street:
 Protocol number:

 Postal code/Town:
 Date:

Installed on: ____

Pos.	Quantity (target)	Quantity (actual)	Article
1	m²	m²	Removing existing floor coverings/m ² Basis
2	m²	m²	Flooring installation
3	m	m	Profile insertion
4	m	m	Attaching skirting boards
5	Pcs.	Pcs.	Shorten doors
6	Pcs.	Pcs.	Shorten door frames
7	Pcs.	Pcs.	Swapping planks

Particularities/remarks: ____

The installed floor was evaluated from a standing position, without angular light or other light refraction (e.g. backlight) and without deviations from situations of use. The floor shows no signs of defects or damage. The cleaning and care instructions for the installed floor were handed over to the user/client.

Signature end user and/or orderer

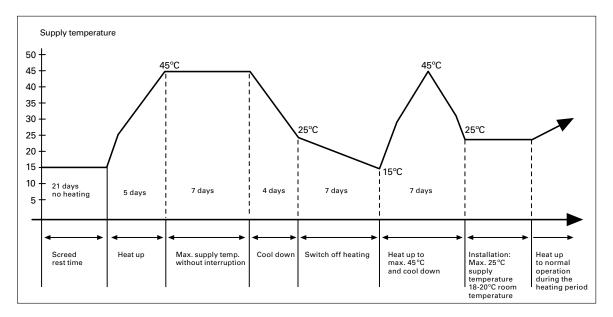
Check list for installation on hot water underfloor heating

As a matter of principle, all mineral substrates must be heated before installing resilient floor coverings so that damaging moisture can no longer escape. This heating process applies to all times of the year, winter or summer.

The screed must be professionally laid according to the generally acknowledged rules of the trade (DIN). It must dry out for at least 21 days before the heating process can begin. We recommend heating the screed according to the following diagram or using the "heating protocol" template. Please observe additional information given by your screed layer and heating engineer.

Note: Also see Section installation options: Installation on underfloor heating

Heating diagram for a hot water underfloor heating system



Please bear in mind: The surface temperature of the resilient flooring should ideally not exceed 25°C (max. 28°C).

Heating protocol for hot water underfloor heating

It is essential to keep a heating protocol for newly installed hot water underfloor heating systems.

1. a) The screed work was finished on	
b) It is a cement, anhydrite screed.	
c) The thickness of the screed is cm.	
2. a) The heated flooring construction was taken into operation on and heated up to 45°C with a daily temperature increase of 5°C (supply temperature).	
b) This maximum temperature was maintained for (target: 7 days) without lowering the temperature at night.	
c) From to to (target: 4 days), the supply temperature was reduced by 5°C a day.	
c) From to (target: 7 days), the heater was shut off.	
e) The heater was started again on and on and the supply temperature of 45 °C was reached.	
f) After reaching the supply temperature of 45°C, the supply temperature was reduced in stages of max. 10°C a day (max. 25°C) until the room temperature reached approx. 18–20°C for the installation of laminate and engineered wood flooring.	yes
g) During the heating and cooling off period, were the areas ventilated but draughts prevented?	yes yes
 The last moisture measurements at the measuring points marked showed% residual moisture. (Permitted values: anhydrite screed max. 0.3 CM %, cement screed max. 1.8 CM %) 	
3. The heated floor surface is hereby approved for the installation of wear layers/floor coverings.	

For the builder/client:

Place/date/signature/stamp

The notes are used to advise the installer/heating engineer and the builder. Warranty claims cannot bederived from this. In case of doubt, corresponding regulations stipulated by the screed layer/heating engineer must be followed.

www.parador.eu

Laminate flooring | Resilient floor coverings | Engineered wood flooring ClickBoard | Panels | Mouldings and accessories

Parador GmbH Millenkamp 7–8 48653 Coesfeld Germany

Hotline +49 (0)2541 736 678 info@parador.de www.parador.de www.facebook.com/parador

Status: 4/2018 © Parador Subject to errors and alterations