## **PAVERLOCK INSTALLATION INSTRUCTIONS**

## 1. Product

Paverlock Jointing sand is a material that has been formulated specifically with the laying contractor in mind, to significantly reduce the loss of sand from the joints in concrete block paved and other narrow joint (2-5mm) paved areas, compared with the loss of sand associated with the use of traditional kiln dried sands.

IMPORTANT: To achieve maximum stability and optimal performance the entire depth of the joints in the paved areas must be completely filled and densified (compacted) with Paverlock Jointing Sand

The product is designed to be cohesive and slightly tacky under wet or rainy conditions, which prevents the jointing sand from being eroded from the joints. After periods of dry weather, the product will harden. Under all conditions, we substantially reduce the loss of jointing sand due weather erosion and due to the use of mechanical sweepers.

The use of angular sand adds to the frictional interlock between the jointing sand and the paving unit. It also aids the effective densification of the sand in the joints.

## 2. Pavement Construction

Block paved areas subjected to vehicular traffic should be designed in accordance with:-

- British Standard 7533: Part 1 heavily trafficked pavements (between 0.5 and 12msa)
- British Standard 7533: Part2 lightly trafficked pavements (up to 0.5msa)
- Heavy duty pavements such as ports and airports should be designed in accordance with Interpave's The Structural Design of Heavy Duty Ports and Other Industries.

All pavements should be constructed in accordance with the British Standard 7533: Part 3, Code of practice for laying precast concrete paving blocks and clay pavers for flexible pavements.

## 3. Installation Instruction

Under dry conditions or after rain, when the surface is still damp:

- 1. Ensure that the paving is fully compacted into the laying course sand.
- 2. Spread and sweep the dry Paverlock Jointing Sand across the surface of the block paved area until the joints appear to be completely full.
- 3. Compact the Paverlock jointing sand using one or more passes of a vibrating plate compactor to densify into the joint.
- 4. Additional Paverlock Jointing should be brushed into the joints and compacted using additional passes of the vibrating plate compactor until the joints are completely full.
- 5. To check that the joints are full, use a fine spray from a hosepipe or watering can over the paved area. If the sand drops in the joint then top up with additional Paverlock Jointing Sand material and use the fine water spray until no further densification occurs.
- 6. Check that the joints are completely full by penetrating with a knife or similar
- 7. Any surplus material can be removed from the paved area.

Installing when the paved area is saturated or it is still raining:-

- 1. Ensure the concrete paving blocks are fully compacted into the laying course sand.
- 2. Depending on the weather conditions, work the area in sections of between 30-40m<sup>2</sup> before proceeding onto the next adjacent area.
- 3. Spread and sweep the Paverlock Jointing sand over the surface of the paved area. Pay particular attention to leaving a layer of sand covering the joints in the paved area
- 4. Compact the Paverlock jointing sand using one or more passes of a vibrating plate compactor to densify into the joint, depending on the dampness of the area
- 5. Do not continue using the vibrating plate compactor if water is pumped from the underlying laying course or sub-base.
- 6. Additional Paverlock Jointing Sand should be brushed into the joints and if possible compacted using a vibrating plate compactor until the joints are completely full.
- 7. Alternatively, fine spray or drizzle of water from a watering can or hose pipe can be used to densify (compact) the Paverlock Jointing Sand in the joints.
- 8. The use of hosepipes should be used with caution and the hosepipe must not be left running, to avoid drenching the laying course sand.
- 9. Powered jet washers should not be used.
- 10. Repeat the process by sweeping additional Paverlock Jointing Sand over the surface and using a fine water spray to densify into the joints (or until there is no further drop of sand in the joints)
- 11. Any surplus jointing sand can be removed from the paved area by brushing or gently swilling the surface.

The use of power water jet is not recommended in the early life of the paved area

No loss of jointing sand after 4-7 days under usual UK climatic conditions

The area is immediately available for normal vehicular traffic.

No mechanical road sweepers should be used on the trial areas for 14 days and dust suppression water bowers should not be used for 24 hours on the area.

Note: As stated in the British Standard 7533: Part 3: Section 5.4.7 – Final compaction of the surface course:-

Following the completion of the joint filling, the surface course should undergo a final compaction using a plate compactor to ensure complete filling of the unit-to-unit joints by the surface applied jointing material.

Where necessary, further jointing material should be added and the paving compacted once more. This process of joint or void topping up should be repeated, when necessary, by brushing in further joint filling material until the integrity of the pavement is established.

This is particularly relevant during the initial period of the pavement life.