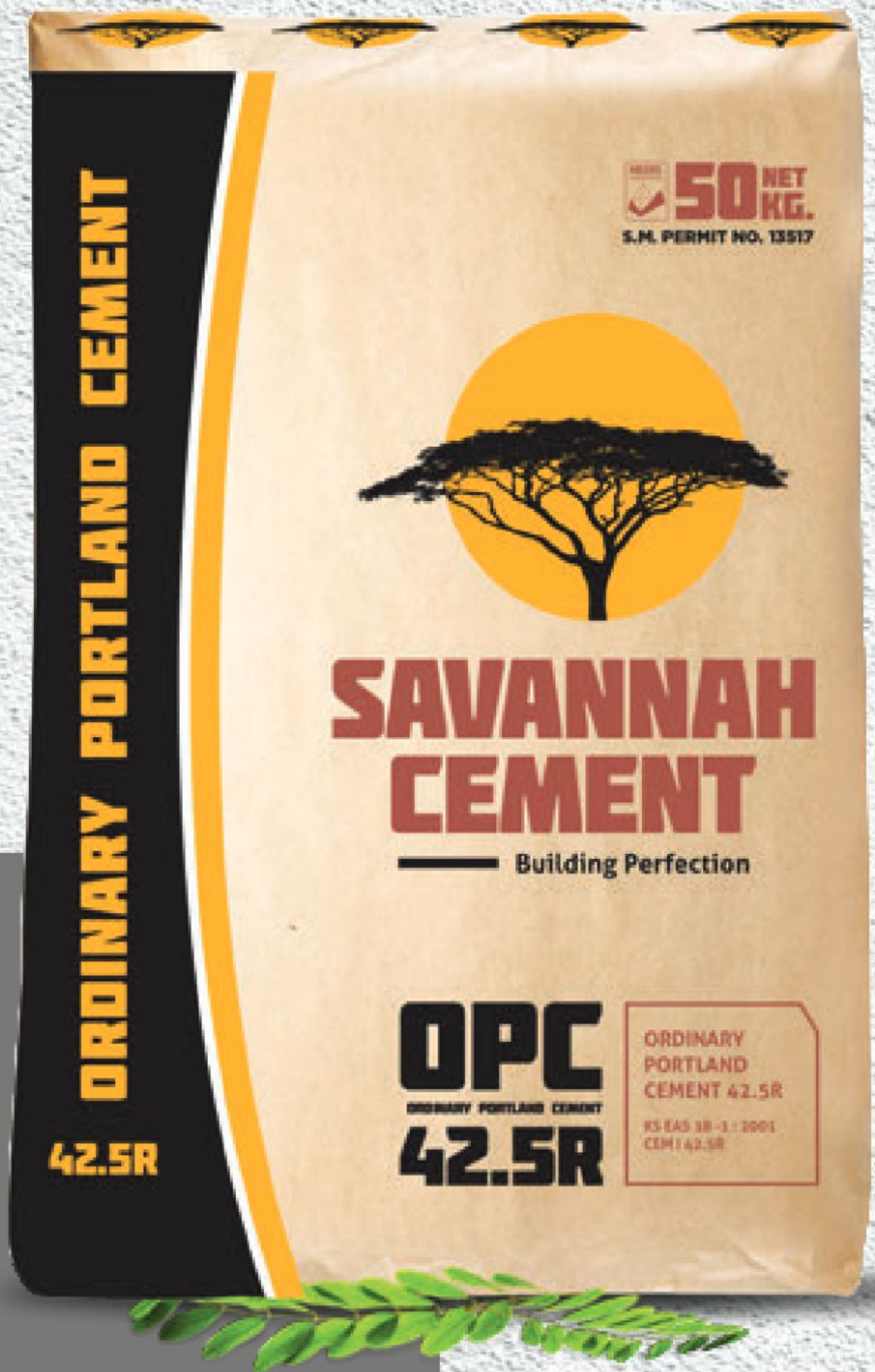




All in One Perfection

Introduction to CEM I 42.5R:

Savannah Cement CEM I 42.5R (cement class traditionally referred to as Ordinary Portland Cement), is a premium high quality technical cement, developed as a superior performance product with an innovative formulation guaranteed to meet high strength requirements at all ages with versatility and enhanced durability benefits.

It provides an effective solution for the major constructions' environment with enhanced construction site productivity.

CEM I 42.5R is specially made for users who need:

- Rapid strength development cement with consistent high strength performance at all ages.
- Rapid setting cement with superior workability for easier handling, placing and finishing.
- Relatively Low water demand thus reduced concrete surface cracking as well as superior strength.
- Excellent Durability that resists aggressive environmental attack due to a very low permeability coefficient.
- Enhanced flowability for easier casting and grouting in complex or congested environments.
- Enhanced concrete cohesion thus sustained uniform concrete performance.
- Better soundness.
- Wide range of specific, cost effective mix formulations.

Composition:

CEM I 42.5R is a CEM I Portland cement type in the 42.5Mpa strength class. Its formulation is based on Portland clinker inter ground with Gypsum and pozzolana, as well as specially formulated active admixture additives to optimize the cement quality performance, with all the product's physical and chemical parameters based on the KS EAS 18 – 1:2001 Standard Requirements that have been adopted from the EN 197 – 1 European Standards .

Availability:

Savannah 42.5R is available in 50kg bags and in bulk.

Application:

This cement type promises excellence in quality for Strength performance optimization projects. These include medium to large scale construction projects such as:

- Dams, reservoirs, bridges
- Road stabilization formulations
- Silos - concrete
- Underground tunnels – Subways
- High rise buildings and structural concrete applications
- Slip forming
- Reinforced Heavy duty surfaces – Foundations, Roads, Ports – Air and Sea port
- Post-tensioning and pre-stressed slabs and beams
- Spun pipe manufacturing
- Pre-cast manufacturing
- Domestic concrete works – foundations, masonry work, brick & block making, medium and high strength concrete works

Storage and Usage information:



TRANSPORT

Transport cement in vehicles with adequate protection from humid weather.



STORAGE

Store bagged cement on a raised floor in a damp proof shed or on a raised platform and cover with waterproof sheeting. Use the cement in the order you've received it, i.e. First in first out (FIFO)



CURING

Concrete on plaster should be kept moist for at least 7 days to prevent cracking and ensure that its strength increases. Spray gently with water and protect with plastic sheets (or wet Hessian) to prevent from drying out.



WATER

In general the more water used for a given quantity of cement, the weaker the concrete or mortar will be. Use optimum amount of water to make the mix workable. Use only clean water free of acidity and alkalinity.



MIXING

Accurately measure all materials with a suitable container (wheelbarrow or bucket). Mix thoroughly until a uniform colour is obtained. Add clean water whilst mixing but avoid adding too much. Mix the cement, sand and aggregate and water on a clean, smooth, dry platform or in a concrete mixing machine. Sieve and wash sand before use. See table for proportions.

Recommended mix proportions by volume using 42.5R:

SAVANNAH CEMENT- 42.5R IS RECOMMENDED FOR	NUMBERS DENOTE VOLUME PROPORTIONS		
	 CEMENT	 SAND	 AGGREGATE
STRUCTURAL APPLICATION: • Suspension slabs • Retain structures	1	1	2
LOW STRENGTH CONCRETE: • Domestic poles • Post foundations	1	3	6
MEDIUM STRENGTH CONCRETE: • Driveways • Light industrial floors un-reinforced	1	1.5	3
NB 1: Use the same size container for measuring all the materials in the batch. See volume proportions above. NB 2: The mix proportions suggested using 1:3:6 will be dependent on the quality of the coarse and fine aggregate. RECOMMENDED TIME FOR REMOVAL OF FORM WORK OR SHUTTERING 1. Side column and beams - 1 day 2. Bottom of slab up to 4.5 metres - 7 days 3. Bottom of slab more than 4.5 metres - 14 days 4. Bottom of slab up to 6.0 metres - 14 days 5. Bottom of slab more than 6.1 metres - 21 days			

Health and safety warning:



- When working with cement wear safety glasses and gloves



- Wash your hands after working with wet cement



- In the event of cement contact with your eyes, rinse thoroughly with water and get medical attention if necessary



- Wear a dust mask



- Wear a safety hat



- Keep out of reach of children at all time