Glossary of Terms used in Concrete Work

The Engineering World publishes a glossary which is of value to every worker in concrete. A standard moneclature is desirable at the present time and the list which follows will be found to be of great service. It is compiled by E. Lee Heidenreich, M.W.S.E., M. Am. Inst. Min. Eng., M. Am. Soc. Test. Mat., and is as follows :

ACCELERATED TEST.—A test generally made to determine soundness of a cement, hastened by subjecting the test specimens to heat, sometimes dry heat, sometimes hot or boiling water. Such tests are determined by hours, while long time tests require days, months or even years.

AGGREGATE. — The sand and gravel or crushed stone combined with cement in the formation of concrete.

ARMORED CONCRETE.—See Reinforced Concrete.

BAG OF CEMENT.—Weighs 95 lbs. or is equivalent to one-fourth of a barrel.

BALL MILLS. — Circular drums used in cement manufacture, grinding clinkers or stone between circumference of the rotating drums and forged steel balls contained in same.

BARREL OF CEMENT.—Weighs 380 lbs. net, contains four bags of cement.

BATCH.—The definite quantity of concrete made at one mixing.

BETON. — The French term for concrete.

BETONE ARME. — The French term for reinforced concrete.

BLOWING.—Overwet mixtures not properly stirred or tamped, show effect of air bubbles on finished surface.

BOND, MECHANICAL. — See Mechanical Bond.

BONDING.-The uniting of one layer or course of concrete with another.

BRIQUETTE. — A small brick of cement paste, mortar or concrete having a definite are at the smallest section and made for testing purposes.

BUSH-HAMMERED. — A method of dressing stone, applicable to concrete, produced by dressing with a hammer having large point-like teeth on the striking face. CARRYING RODS. — Term used to

CARRYING RODS.—Term used to designate those rods which carry or sustain the load; they extend lengthwise in the reinforced member.

CEMENT.—A preparation of calcined clay and limestone or their equivalents possessing the property of hardening into a solid mass when moistened with water-

CEMENT MORTAR.-Mortar composed of cement, sand and water.

CEMENT SAMPLER.—A small tool used to take a sample of cement from a barrel for testing purposes. CENTERING. — A wooden form giving shape to a concrete arch while setting.

CENTRES.—Same as centering. CHECKS.—Same as hair cracks.

CINDER CONCRETE.—Concrete in which cinders are used as one of the aggregates.

CONCRETE—A compact mass of broken stone, gravel or other suitable material assembled together with cement mortar and allowed to harden.

CONCRETE STEEL.—See Reinforced Concrete.

CONSTRUCTION JOINT.—The seam between two successive days' work in concrete laying.

CORRUGATED BAR. — A form of reinforcing steel, made by pressing the surface of a plain bar into a series of ridges or corrugations.

CRAZE.—Same as hair cracks generally the result of too rich a mixture — occasionally a sign of unsound cement.

CRUSHER RUN. — Crushed stone taken directly from the crusher with none of the fine materials screened out.

DISTRIBUTING RODS.—Term used to designate those rods which distribute the load over the carrying rods; they extend crosswise in the reinforced member.

DRESSING.—The finish given to the surface of concrete.

DRY MIX OR DRY MIXTURE.—A concrete mixed with so little water that very hard ramming is required to flush the water to the surface.

EARLY STAGE.—The first part of the chemical process cement mortar undergoes after mixing, such as initial set and final set both of which precede hardening.

EFFLORESCENCE.—A white discoloration appearing on the surface of concrete, due to the leaching out of soluble salts.

EXPANDED METAL.—A form of reintorcing material, made by cutting sheet steel in a series of short parallel rows, and drawing the sheet to form diamond-shaped meshes.

EXPANSION CRACK.—Cracking in concrete work caused by expansion.

EXPANSION JOINT.—A vertical joint or opening to allow for variations due to changes of temperature. Experie Wire Eabric

FABRIC WIRE.—See Wire Fabric. FACING.—A rich mortar placed on exposed surfaces to make a smooth finish.

FALSEWORK.—Wooden or other supports for holding concrete in position while setting.

FERRO-CEMENT.—See Reinforced Concrete.

FERRO-CONCRETE. — See Reinforced Concrete.

FINAL SET.—Is reached when a paste, mortar or concrete will support a pressure of the thumb without indenting—an arbitrary period of setting of concrete just preceding hardening. FINENESS OF CEMENT.—Is the degree of pulverization, and for either cement or sand is measured in terms of the numbers of the two sieves between which it is held.

FINISHING.—Working the concrete or mortar surface with steel trowels or similar tools, as for instance by brush, called brush finish.

FIREPROOFING. — Protection of structural parts that are subject to damage by fire, by covering them with a material that will withstand much heat, for instance reinforced concrete.

FLOATING.—Preparing the roughly spread mortar for the steel trowel by the use of a wooden or cork float. If this floating is used for a finish, it is called float-finish.

FLUSH.—To bring water to the surface of concrete by compacting or ramming. FORMS.—Wooden or other moulds

FORMS.—Wooden or other moulds to give concrete the desired shape until hardened.

GUAGING.—Determining the proportions of cement, sand, gravel or broken stone and water in concrete. Generally used in specifying the quantity of water that will produce a certain consistency.

GRANOLITHIC. — Concrete in which the stone aggregate is very fine; its most general use being as a top surface for concrete walks.

GRAPPIERS CEMENT.—A French cement made by grinding particles which have escaped disintegration in the manufacture of hydraulic limes.

GRAVEL.—Mixed rounded pebbles, used as one of the aggregates in concrete.

GROUT.—A thin mortar composed of sand, cement and water; either poured or applied with a brush.

HAIR CRACKS. — Fine hair - like cracks on the surface of a cement or concrete structure which has stood for some time.

HARDENING. — Commences after the final set of a cement, mortar or concrete and continues for a number of years.

HIGH CARBON STEEL.—A steel in which the elastic limit is not less than 52,500 lbs. per sq. inch.

HINGE JOINTS. — Joints which divide a structure into several sections, each one of which can expand independent of the others.

HOOPED CONCRETE. --- Concrete columns reinforced with wires wound spirally.

HYDRATED LIME.—Made by mixing quicklime and water; the chemical formula is $CaO + H_2O = CaO \cdot H_2$.

HYDRAULIC CEMENT. — Any cement which sets or hardens under water.

INITIAL SET.—A certain stage of solidification in cement defined by the length of time required ; vary-

June 5, 1907

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