

# TYTRO<sup>®</sup> RM 470

Workability-enhancing admixture for shotcrete

---

## Product Description

TYTRO<sup>®</sup>RM 470 Slump Enhancer is a revolutionary advancement in time-activated polycarboxylatebased technology. This patent-pending, workability-enhancing (slump and flow) admixture, when used in conjunction with any water reducers (standard, mid-range, or high range), will significantly increase the duration of slump or flow retention. TYTRO<sup>®</sup>RM 470 Slump Enhancer is formulated to comply with the requirements of AS 1478 Type SN. TYTRO<sup>®</sup>RM 470 Slump Enhancer does not contain chloride as a functional ingredient. TYTRO<sup>®</sup>RM 470 Slump Enhancer is manufactured under closely controlled conditions and formulated for use as received. One litre weighs approximately 1.05kg.

## Product Advantages

- Flexible degree of slump retention through adaptable dosing
- Increases slump life with minimal impact on set times
- Better control of operational costs by adjusting the slump life retention on an “as needed” basis during the initial dosage adjustment
- Eliminates the need for re-tempering with water at the job site
- Improves workability at job sites resulting in ease of placement

## Uses

TYTRO<sup>®</sup>RM 470 Slump Enhancer is specifically intended for use where extended workability with minimal time of setting extension is desired without compromising plastic or hardened concrete properties. TYTRO<sup>®</sup>RM 470 Slump Enhancer produces concrete with consistent slump properties while providing the degree of workability necessary to provide easy placement and consolidation.

Conventional high range water reducers may not provide sufficient slump life for applications with unpredictable or long transportation and placement times. As a result, shotcrete may be re-tempered with water at a job site to achieve desired workability. The addition of TYTRO<sup>®</sup>RM 470 Slump Enhancer used in conjunction with TYTRO<sup>®</sup>WR Superplasticisers eliminates the need for re-tempering at job sites to achieved the desired workability.

## Addition Rates

Addition rates of TYTRO<sup>®</sup>RM 470 Slump Enhancer can vary with the type of application and the desired slump specifications, but will range from 100 to 500mL / 100kg of cementitious as an extended slump life admixture. In most instances, the addition of 100 to 300mL / 100kg of cementitious will be sufficient. At higher dosage rates, some water may have to be removed from the mix to maintain plastic concrete cohesion. GCP Applied Technologies strongly recommends pretrial testing the shotcrete (lab+field) with TYTRO<sup>®</sup>RM 470 Slump Enhancer before production use to optimise dosage rates due to shotcrete materials, ambient conditions and project requirements that change over time. Please consult your local GCP representative for more information and assistance.

## Compatibility with Other Admixtures

TYTRO®RM 470 Slump Enhancer is compatible with all TYTRO® shotcrete admixtures from GCP Applied Technologies. In general, it is recommended that TYTRO®RM 470 Slump Enhancer be added to the shotcrete mix near the end of the batch sequence for optimum performance. Different sequencing may be used if local testing shows better performance.

Pretesting of the shotcrete mix should be performed before use and as conditions and materials change in order to assure compatibility with other admixtures, and to optimise dosage rates, addition times in the batch sequencing and concrete performance.

## Dispensing Equipment

Please contact your local GCP representative for further information regarding the dispensing equipment for this product.

## Packaging and Handling

TYTRO®RM 470 Slump Enhancer is available in bulk delivered by metered trucks, in 1,000L disposable totes and 205L drums.

TYTRO®RM 470 Slump Enhancer should be stored at temperatures above 0°C and below 50°C for proper dispensing and use. It will begin to freeze at 0°C, but will return to full strength after thawing and thorough agitation.

Material Safety Data Sheet is available on request.

## Health and Safety

Please refer to TYTRO®RM 470 Slump Enhancer MSDS or consult GCP Applied Technologies.

[gcpat.uk](http://gcpat.uk) | United Kingdom customer service: +44 (0) 1480 478421

We hope the information here will be helpful. It is based on data and knowledge considered to be true and accurate, and is offered for consideration, investigation and verification by the user, but we do not warrant the results to be obtained. Please read all statements, recommendations, and suggestions in conjunction with our conditions of sale, which apply to all goods supplied by us. No statement, recommendation, or suggestion is intended for any use that would infringe any patent, copyright, or other third party right.

TYTRO is a trademark, which may be registered in the United States and/or other countries, of GCP Applied Technologies, Inc. This trademark list has been compiled using available published information as of the publication date and may not accurately reflect current trademark ownership or status.

© Copyright 2018 GCP Applied Technologies, Inc. All rights reserved.

This document is only current as of the last updated date stated below and is valid only for use in the United Kingdom. It is important that you always refer to the currently available information at the URL below to provide the most current product information at the time of use. Additional literature such as Contractor Manuals, Technical Bulletins, Detail Drawings and detailing recommendations and other relevant documents are also available on [www.gcpat.uk](http://www.gcpat.uk). Information found on other websites must not be relied upon, as they may not be up-to-date or applicable to the conditions in your location and we do not accept any responsibility for their content. If there are any conflicts or if you need more information, please contact GCP Customer Service.

Last Updated: 2025-05-13

[gcpat.uk/solutions/products/tytro-shotcrete-system/tytro-rm-470](http://gcpat.uk/solutions/products/tytro-shotcrete-system/tytro-rm-470)