



ADING TECHNOLOGIES AND SOLUTIONS FOR THE CEMENT INDUSTRY





#### **INTRODUCTION**

ADING continuously innovates and creates new solutions for the cement industry. Cement, as the basic product of the construction industry, has been the focus of our R&D team for many years, and our goals are:

ASSISTANCE IN CREATING HIGH-QUALITY CEMENT WITH IMPROVED PERFORMANCES

DECREASING THE ENERGY CONSUMPTION FOR CEMENT PRODUCTION AND OPTIMIZING THE COST OF THE PRODUCTION

DECREASING THE EMISSION OF CO2 DURING THE PRODUCTION PROCESS AND REDUCING THE NEGATIVE IMPACT ON THE ENVIRONMENT

OFFERING SUPPORT FOR SUSTAINABLE DEVELOPMENT FOR OUR PARTNERS IN THE CEMENT INDUSTRY

The experience gained through our work over the years has inspired us to create a flexible and adaptable approach to each client individually, and offer tailor-made solutions.

The preparedness of our experts for on-site appearance and work at all times, our direct approach, and the constant communication with the development teams in the cement factories are guaranteed to give excellent results.









## **TECHNOLOGIES AND SOLUTIONS**

01

Additives that improve the grinding efficiency of clinker, fillers and raw materials for cement production

Name of additiveDosage [g/t]Mill typeINTENZIFIKATOR AM200-400HORIZONTALINTENZIFIKATOR SB10200-600HORIZONTAL

02

Additives that improve the grinding efficiency of clinker/fillers and enhance the early strength of the manufactured cement

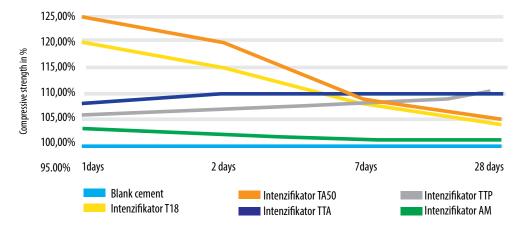
| Name of additive     | Dosage [g/t] | Mill type         |  |
|----------------------|--------------|-------------------|--|
| INTENZIFIKATOR TA50  | 200-600      | VERTICAL /HORIZON |  |
| INTENZIFIKATOR T18   | 1000-1500    | HORIZONTAL        |  |
| INTENZIFIKATOR TDK18 | 200-600      | HORIZONTAL        |  |
| INTENZIFIKATOR       | 200-400      | HORIZONTAL        |  |
| INTENZIFIKATOR KC    | 200-600      | HORIZONTAL        |  |

03

Additives that improve the grinding efficiency of clinker/fillers and enhance the late strength of the manufactured cement

| Name of additive   | vosage [g/t] | Mili type            |
|--------------------|--------------|----------------------|
| INTENZIFIKATOR TTP | 200-400      | VERTICAL /HORIZONTAL |
| INTENZIFIKATOR TTA | 200-400      | VERTICAL/HORIZONTAL  |
| INTENZIFIKATOR 30V | 200-500      | HORIZONTAL           |

#### PERCENTAGE OF COMPRESSIVE STRENGTH COMPARED TO BLANK CEMENT





# PRODUCTS AND CHARACTERISTICS

|                    | INTENZIFIKATOR   | INTENZIFIKATOR TTP  | INTENZIFIKATOR T18   | INTENZIFIKATOR<br>TA50   | INTENZIFIKATOR AM   |
|--------------------|--|---|--|--|---|
| Cement<br>type     | Most types of<br>cement, from CEM<br>I to CEM V                          | For cement with increased content of additives                            | Most types of cement, from CEM I to CEM V                                  | For cement with in-<br>creased limestone-<br>content                       | Most types of cement, from CEM I to CEM V                               |
| Mill type          | Horizontal   | Horizontal and vertical   | Horizontal   | Horizontal and vertical  | Horizontal  |
| Grinding effect    | Increases the mill capacity by 10-20%                                    | Increases the mill capacity by 10-20%                                     | Increases the mill capacity by 5-15%                                       | Increases the mill<br>capacity by 10-<br>20%                               | Increases the mill capacity by 5-15%                                    |
| Early<br>strengths | Increases the early<br>strengths by 5-10%<br>compared to blank<br>cement | Increases the early<br>strengths by 5%<br>compared to blank<br>cement     | Increases the early<br>strengths by 10-<br>20% compared to<br>blank cement | Increases the early<br>strengths by 15-<br>25% compared to<br>blank cement | no effect   |
| Late<br>strengths  | Increases the late<br>strengths by 5%<br>compared to blank<br>cement     | Increases the late<br>strengths by 5-10%<br>compared to blank<br>cement   | Increases the late<br>strengths by 5%<br>compared to blank<br>cement       | Increases the late<br>strengths by 5%<br>compared to blank<br>cement       | no effect   |
| Dosage             | 200-400 g/t  | 200-400 g/t   | 1000-1500 g/t  | 200-600 g/t  | 200-400 g/t   |
|                    | INTENZIFIKATOR<br>SB10   | INTENZIFIKATOR<br>TDK18   | INTENZIFIKATOR KC  | INTENZIFIKATOR<br>TTA  | INTENZIFIKATOR 30V  |
| Cement<br>type     | For grinding raw<br>materials for<br>cement production                   | For cement with increased content of additives                            | Most types of<br>cement, from CEM I<br>to CEM V                            | For cement<br>containing<br>pozzolanic<br>and limestone<br>additives       | For cement with increased limestone content                             |
| Mill type          | Horizontal   | Horizontal  | Horizontal   | Horizontal and vertical  | Horizontal  |
| Grinding<br>effect | Increases the mill capacity by 5-15%                                     | Increases the mill capacity by 5-15%                                      | Increases the mill capacity by 5-15%                                       | Increases the<br>mill capacity by<br>10-20%                                | Increases the mill capacity by 10-20%                                   |
| Early<br>strengths | no effect  | Increases the early<br>strengths by 10-20%<br>compared to blank<br>cement | Increases the early<br>strengths by 10-<br>20% compared to<br>blank cement | Increases the early<br>strengths by 5%<br>compared to blank<br>cement      | Increases the early<br>strengths by 5%<br>compared to blank<br>cement   |
| Late<br>strengths  | no effect  | Increases the late<br>strengths by 5%<br>compared to blank<br>cement      | Increases the late<br>strengths by 5%<br>compared to blank<br>cement       | Increases the<br>late strengths by<br>5-10% compared<br>to blank cement    | Increases the late<br>strengths by 5-10%<br>compared to blank<br>cement |
| Dosage             | 200-600 g/t  | 200-600 g/t   | 200-600 g/t  | 200-400 g/t  | 200-500 g/t   |



# TEAM, LABORATORY, AND EQUIPMENT

The company's R&D sector consists of technologists and chemists who have inherited more than 50 years of experience in the production of construction materials. Our laboratories are equipped with all the necessary equipment and resources to carry out the necessary tests. The experts from our R&D team are constantly available for assistance and support during the industrial tests in the cement factories.





# NECESSARY INFORMATION FOR DETERMINATION OF THE TYPE OF ADMIXTURE INTENDED FOR CEMENT PRODUCTION

- What type of cement mill does your cement factory have, vertical or horizontal? Specify the conditions of the production process (capacity and typical production conditions).
- 2 List the basic information related to the mineralogical composition of the clinker.
- Which type of cements do you produce (declaration according to EN), clinker content, types and quantity of additional compounds used?
- Which type of cement is dominant in your production?
- What are the typical problems that you face with during cement production (originating from the initial raw materials and the technological aspects of production)?
- Does the need for bigger production capacity or the improvement of the performance characteristics of the cement prevails?
- Which of the performance characteristics of the cement needs to be improved with the usage of the admixture for cement production?
- Are you currently using any admixture for cement production? If so please state the performance improvement that you are getting from the admixture currently used.
- Which are the negative experiences, if any, from using admixtures for cement production in your plant?





## WHO WE ARE

ADING is a company for the production of chemical materials in the construction industry since 1969. Our product program consists of more than 120 products, divided into 12 product groups. The company is a leader in its field in Southeast Europe with a permanent presence throughout the region.



CONSTRUCTION
CHEMICALS SINCE 1969









