

Керамические насосы, клапаны и уплотнения для управления жидкостями

Технические характеристики

По вопросам продаж и поддержки обращайтесь:

Алматы (727)345-47-04
Ангарск (3955)60-70-56
Архангельск (8182)63-90-72
Астрахань (8512)99-46-04
Барнаул (3852)73-04-60
Белгород (4722)40-23-64
Благовещенск (4162)22-76-07
Брянск (4832)59-03-52
Владивосток (423)249-28-31
Владикавказ (8672)28-90-48
Владимир (4922)49-43-18
Волгоград (844)278-03-48
Вологда (8172)26-41-59
Воронеж (473)204-51-73
Екатеринбург (343)384-55-89

Иваново (4932)77-34-06
Ижевск (3412)26-03-58
Иркутск (395)279-98-46
Казань (843)206-01-48
Калининград (4012)72-03-81
Калуга (4842)92-23-67
Кемерово (3842)65-04-62
Киров (8332)68-02-04
Коломна (4966)23-41-49
Кострома (4942)77-07-48
Краснодар (861)203-40-90
Красноярск (391)204-63-61
Курск (4712)77-13-04
Курган (3522)50-90-47
Липецк (4742)52-20-81

Магнитогорск (3519)55-03-13
Москва (495)268-04-70
Мурманск (8152)59-64-93
Набережные Челны (8552)20-53-41
Нижний Новгород (831)429-08-12
Новокузнецк (3843)20-46-81
Ноябрьск (3496)41-32-12
Новосибирск (383)227-86-73
Омск (3812)21-46-40
Орел (4862)44-53-42
Оренбург (3532)37-68-04
Пенза (8412)22-31-16
Петрозаводск (8142)55-98-37
Псков (8112)59-10-37
Пермь (342)205-81-47

Ростов-на-Дону (863)308-18-15
Рязань (4912)46-61-64
Самара (846)206-03-16
Санкт-Петербург (812)309-46-40
Саратов (845)249-38-78
Севастополь (8692)22-31-93
Саранск (8342)22-96-24
Симферополь (3652)67-13-56
Смоленск (4812)29-41-54
Сочи (862)225-72-31
Ставрополь (8652)20-65-13
Сургут (3462)77-98-35
Сыктывкар (8212)25-95-17
Тамбов (4752)50-40-97
Тверь (4822)63-31-35

Тольятти (8482)63-91-07
Томск (3822)98-41-53
Тула (4872)33-79-87
Тюмень (3452)66-21-18
Ульяновск (8422)24-23-59
Улан-Удэ (3012)59-97-51
Уфа (347)229-48-12
Хабаровск (4212)92-98-04
Чебоксары (8352)28-53-07
Челябинск (351)202-03-61
Череповец (8202)49-02-64
Чита (3022)38-34-83
Якутск (4112)23-90-97
Ярославль (4852)69-52-93

Россия +7(495)268-04-70

Казахстан +(727)345-47-04

Беларусь +(375)257-127-884

Узбекистан +998(71)205-18-59

Киргизия +996(312)96-26-47

эл.почта: cgc@nt-rt.ru || сайт: <https://ceramtec.nt-rt.ru>

Unique applications require unique partnerships

With extensive material expertise, unique technology capabilities and comprehensive application know-how we design, develop and implement highly-customized innovative ceramic solutions to help our customers achieve significant competitive advantages.

PUMPS, VALVES AND SEALS

Ceramic Solutions for Fluid Management

Advanced Ceramics for Fluid Handling Applications



Customized ceramic solutions for demanding applications

With over 100 years of production and development experience, CeramTec is one of the leading providers of advanced ceramic solutions worldwide. Based on our extensive material expertise and application know-how, we offer our customers unique globally networked engineering and solution competence.

From automotive, chemical and mechanical engineering to plant engineering and medical technology – leading global customers rely on our unique competence and capabilities to develop highly customized solutions for demanding industry application needs.

Why ceramics in your application?

Wear is one of the main reasons why pumps can be impaired in their function. Depending on the extent, the impairment can lead to the complete failure of the process line and cause immense economic damage. During fluid transport in industrial and hygienic environment both the pump unit as well as handling components, such as pipes and valves can also be exposed to high stresses and are therefore subject to wear and corrosion.

Due to their specific properties such as hardness, toughness, chemical or temperature resistance, depending on the application, ceramic solutions can significantly contribute to reducing or even neutralizing wear effects. Thus, compared to other materials such as metal or plastic, ceramics opens up enormous performance potentials and can help achieving application-specific competitive advantages.

Sustainable lead-free alternative for many parts in process components

According to The Restriction of Hazardous Substances Directive 2002/95/EC (RoHS) using the lead-containing metal (like brass, lead-based bearing alloys, lead-in alloys, etc.) is to be limited. Ceramic, as non-lead high performance material is a perfect alternative to many applications, where amount of lead must be reduced.



Your benefits with ceramic solutions from CeramTec

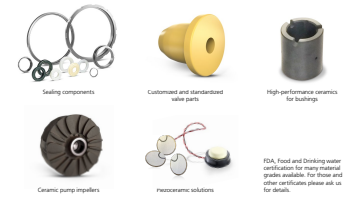
- Wide range of high-performance ceramic materials
- Ductile R & D teams and application development
- Variety of ceramic forming capabilities: from die casting and dry pressing, over isostatic pressing and extrusion to 3D printing technology
- Higher operational rates and longer service life for your industry pump application
- Increased process reliability and better economic efficiency
- Excellent wear and corrosion resistance through unique tribological properties

Less wear, more efficiency: ceramic solutions for industry pumps

In demanding industry environment, advanced ceramic solutions from CeramTec set standards for process reliability and performance. We have developed gaskets, bearings, sealing and control technology with high-performance ceramics – with outstanding tribological, chemical and physical properties. This allows highly tailored components in pumps, valves, machines and

systems to run reliably, with high economic efficiency and low wear, even under extreme operating conditions. For each application and each requirements profile – from micro-dosing pumps in medical technology to large power plant pumps – together with you we develop individual solutions based on optimum selection and material setup as well as customized component design.

Exemplary products for industry pump applications



Sealing components

Customized and standardized water parts

High-performance ceramics for bearings

Ceramic pump impellers

Recessed solutions

FDA, Food and Drinking water certification for many material grades available. For those and other certifications please see us for details.

Material Properties	Aluminum Oxide (Al ₂ O ₃)	Zirconium Oxide (ZrO ₂)	Silicon Carbide (SiC)	Silicon Nitride (Si ₃ N ₄)
Compressive strength	coldest grades with tensile strength 95-99.7 available	available with 100% or 100% stabilization	available in SiC, SiC or graphite based SiC	available in SiC, SiC or graphite based SiC
Density	3.95 - 3.97 g/cm ³	5.60 - 5.65 g/cm ³	3.20 - 3.25 g/cm ³	3.4 g/cm ³
Working strength	200 - 400 MPa	500 - 1000 MPa	200 - 400 MPa	400 MPa
Maximum velocity	1500 - 2000	2000 - 2500	1000 - 2000	1500
Honey's Modulus	150 - 180 GPa	210 GPa	310 - 430 GPa	320 GPa
Thermal Conductivity	18 - 30 W/mK	1 W/mK	120 - 170 W/mK	30 W/mK
Thermal Expansion Coefficient 30 - 400 °C	1.1 - 1.5 10 ⁻⁶ /K	10 - 14.5 10 ⁻⁶ /K	3.7 - 4.2 10 ⁻⁶ /K	3.1 10 ⁻⁶ /K

Indicative values only. For detailed parameters see technical information please contact CeramTec Sales.

Ready for your ceramic solution? Get in touch with us. We are looking forward to discuss your individual application requirements.

По вопросам продаж и поддержки обращайтесь:

Алматы (727)345-47-04
Ангарск (3955)60-70-56
Архангельск (8182)63-90-72
Астрахань (8512)99-46-04
Барнаул (3852)73-04-60
Белгород (4722)40-23-64
Благовещенск (4162)22-76-07
Брянск (4832)59-03-52
Владивосток (423)249-28-31
Владикавказ (8672)28-90-48
Владимир (4922)49-43-18
Волгоград (844)278-03-48
Вологда (8172)26-41-59
Воронеж (473)204-51-73
Екатеринбург (343)384-55-89

Иваново (4932)77-34-06
Ижевск (3412)26-03-58
Иркутск (395)279-98-46
Казань (843)206-01-48
Калининград (4012)72-03-81
Калуга (4842)92-23-67
Кемерово (3842)65-04-62
Киров (8332)68-02-04
Коломна (4966)23-41-49
Кострома (4942)77-07-48
Краснодар (861)203-40-90
Красноярск (391)204-63-61
Курск (4712)77-13-04
Курган (3522)50-90-47
Липецк (4742)52-20-81

Магнитогорск (3519)55-03-13
Москва (495)268-04-70
Мурманск (8152)59-64-93
Набережные Челны (8552)20-53-41
Новокузнецк (3843)20-46-81
Ноябрьск (3496)41-32-12
Новосибирск (383)227-86-73
Омск (3812)21-46-40
Орел (4862)44-53-42
Оренбург (3532)37-68-04
Пенза (8412)22-31-16
Петрозаводск (8142)55-98-37
Псков (8112)59-10-37
Пермь (342)205-81-47

Ростов-на-Дону (863)308-18-15
Рязань (4912)46-61-64
Самара (846)206-03-16
Санкт-Петербург (812)309-46-40
Саратов (845)249-38-78
Севастополь (8692)22-31-93
Саранск (8342)22-96-24
Симферополь (3652)67-13-56
Смоленск (4812)29-41-54
Сочи (862)225-72-31
Ставрополь (8652)20-65-13
Сургут (3462)77-98-35
Сыктывкар (8212)25-95-17
Тамбов (4752)50-40-97
Тверь (4822)63-31-35

Тольятти (8482)63-91-07
Томск (3822)98-41-53
Тула (4872)33-79-87
Тюмень (3452)66-21-18
Ульяновск (8422)24-23-59
Улан-Удэ (3012)59-97-51
Уфа (347)229-48-12
Хабаровск (4212)92-98-04
Чебоксары (8352)28-53-07
Челябинск (351)202-03-61
Череповец (8202)49-02-64
Чита (3022)38-34-83
Якутск (4112)23-90-97
Ярославль (4852)69-52-93

Россия +7(495)268-04-70

Казахстан +(727)345-47-04

Беларусь +(375)257-127-884

Узбекистан +998(71)205-18-59

Киргизия +996(312)96-26-47

эл.почта: cgc@nt-rt.ru || сайт: <https://ceramtec.nt-rt.ru>