

Innovation



CTCK120

The wear resistant all-rounder for cast iron machining



EN



Application - customer benefits

Industries

- Automotive
- Mechanical engineering
- Power generation
- Railway vehicles

Materials

- Grey cast iron with lamellar graphite (GJL/GG)
- Vermicular cast iron / compacted graphite iron (GJV/GGV/CGI)
- Spheroidal graphite cast iron (GJS/GGG/SGI)
- Austempered ductile iron (ADI)

Typical components

- Brake disk
- Brake drum
- Turbocharger housing
- Flywheel
- Bearing case

Product advantages

Optimized coating adhesion



High wear resistance



High toughness



Universal application



Consistent results



Wide standard program



Your benefits

High process security combined with consistent quality of the work piece surface

High cutting parameters also with interrupted cut
Suitable for roughing and finishing

Process security also with interrupted cut

For all cast iron materials – roughing and finishing

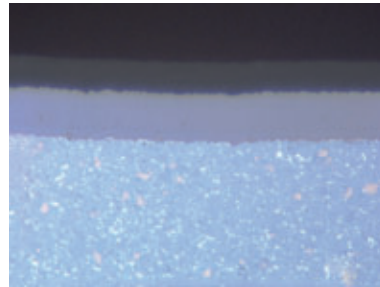
Fixed tool change intervals can be close to the limit of tool life

The correct insert for every operation available in stock



Cutting materials

CTCK120



- Coating thickness 16 μm
- Al_2O_3 -based coating
- CVD coating

Brake disk



Cutting data: $v_c = 450\text{m/min}$
 $a_p = 2\text{-}2.5\text{mm}$
 $f_p = 0.4\text{mm}$

Material: GG-25; rough turning of brake disk

CERATIZIT:
Tool life: 95 parts

Competitor/benchmark
Tool life: 60 parts



Result:

Turbocharger housing



Cutting data: $v_c = 140\text{m/min}$
 $a_p = 2.5\text{ mm}$
 $f_p = 0.3\text{ mm}$

Material: GGG-60; rough turning of housing surface

CERATIZIT:
Tool life: 60 parts

Competitor/benchmark:
Tool life: 45 parts



Result:

Flywheel



Cutting data: $v_c = 280\text{m/min}$
 $a_p = 2\text{ mm}$
 $f_p = 0.5\text{ mm}$

Material: GGG-50; rough turning of contact faces

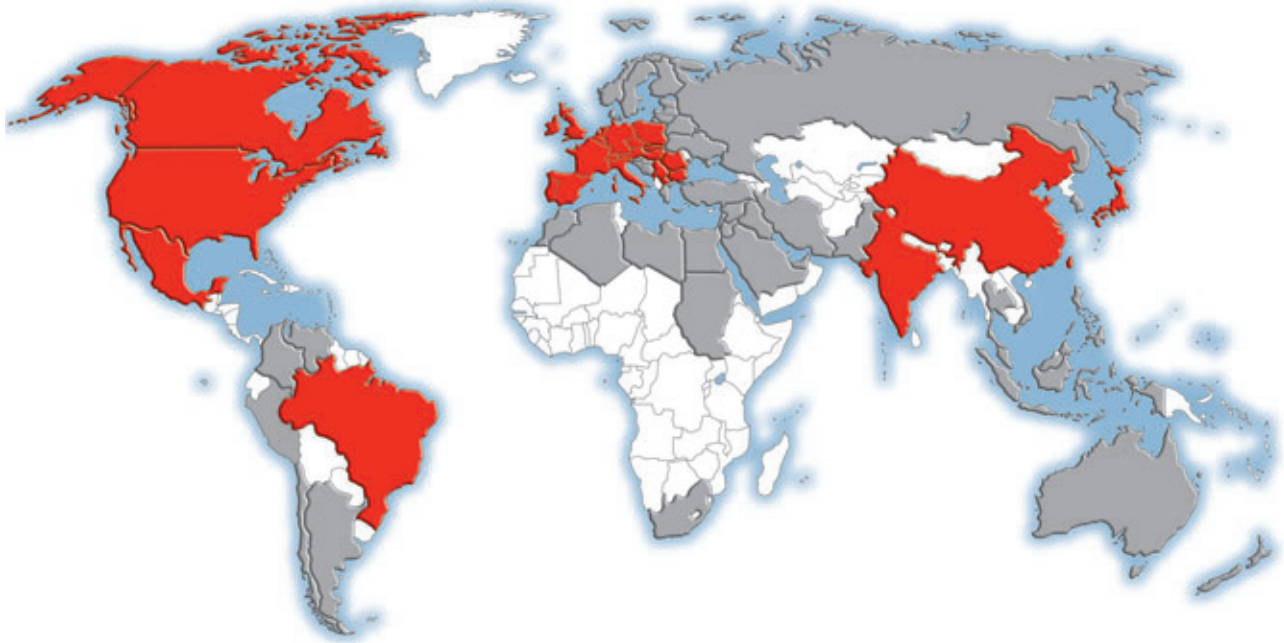
CERATIZIT:
Tool life: 18 parts

Competitor/benchmark:
Tool life: 15 parts



Result:

CERATIZIT worldwide



- CERATIZIT worldwide production sites and support centres
- CERATIZIT worldwide distribution partner network



www.ceratizit.com

Parent company in Luxembourg

CERATIZIT Luxembourg Sàrl
Route de Holzem 101
L-8232 Mamer
Tel.: +352 312 085-1
Fax: +352 311 911
E-mail: info@ceratizit.com
www.ceratizit.com

Contact for further information:

CERATIZIT Austria Gesellschaft m.b.H.
6600 Reutte/Tyrol

Tel.: +43 (5672) 200-0
Fax: +43 (5672) 200-502
E-mail: info.austria@ceratizit.com

