

Title (en)
HEAT TREATMENT FURNACE

Title (de)
WÄRMEBEHANDLUNGSOVEN

Title (fr)
FOUR DE TRAITEMENT THERMIQUE

Publication
EP 3896375 A1 20211020 (EN)

Application
EP 20774866 A 20200217

Priority
JP 2020006127 W 20200217

Abstract (en)

The description herein discloses a heat treatment furnace that performs heat treatment efficiently on a treatment-target object conveyed on a conveying path defined by a plurality of guide rollers. This heat treatment furnace includes a furnace body, a conveyor device configured to convey a treatment-target object from a conveying inlet to a conveying outlet through a treatment chamber, a plurality of guide rollers disposed in the treatment chamber, and a heating device disposed in the treatment chamber and configured to heat the treatment-target object. The heating device includes first heaters, each of which is disposed inside and/or near its corresponding one of the plurality of guide rollers and configured to heat the treatment-target object. The heating device further includes second heaters each disposed on the conveying path of the treatment-target object near an intermediate position between its corresponding guide rollers that are adjacent in a conveying direction and configured to heat the treatment-target object. The second heaters are each a heater configured to emit electromagnetic waves in an infrared region.

IPC 8 full level
F26B 13/08 (2006.01); **B29C 71/02** (2006.01); **F26B 23/04** (2006.01); **F27B 9/14** (2006.01); **F27B 9/36** (2006.01); **F27D 11/02** (2006.01)

CPC (source: EP KR)
F26B 3/12 (2013.01 - KR); **F26B 3/30** (2013.01 - EP KR); **F26B 13/08** (2013.01 - EP); **F26B 13/10** (2013.01 - EP); **F26B 13/14** (2013.01 - KR);
F26B 13/145 (2013.01 - KR); **F26B 21/14** (2013.01 - EP)

Cited by
CN114941938A

Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)
BA ME

DOCDB simple family (publication)
EP 3896375 A1 20211020; EP 3896375 A4 20211201; CN 113544452 A 20211022; JP 6793875 B1 20201202; JP WO2021166048 A1 20210826;
KR 102266685 B1 20210621; TW 202132739 A 20210901; TW I751685 B 20220101; WO 2021166048 A1 20210826

DOCDB simple family (application)
EP 20774866 A 20200217; CN 202080001224 A 20200217; JP 2020006127 W 20200217; JP 2020509562 A 20200217;
KR 20207022414 A 20200217; TW 109131020 A 20200910