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(54) **DIRECTIONAL COOLING ARRANGEMENT FOR TURBINE AIRFOILS**

DIREKTIONALE KÜHLANORDNUNG FÜR TURBINENSCHAUFEL

AGENCEMENT DE REFRROIDISSEMENT DIRECTIONNEL DESTINÉ À DES AUBES DE TURBINE

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(56) References cited:  
**EP-A2- 1 659 264 EP-A2- 2 138 675**  
**EP-A2- 3 032 035 US-A1- 2016 010 463**

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