



### **Deliverable D2.2**

# Design and costs of heat basket type GSHEs using easy drill up to 325 mm

#### WP2

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Project acronym Cheap-GSHPs

Project full title Cheap and Efficient Application of reliable Ground Source

Heat Exchangers and Pumps

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**Lead beneficiary** REHAU AG & Co – Mario Psyk

Other authors Chapter 5 UNIPD-IE

Prof. Michele De Carli; Dr. Eng. Giuseppe Emmi;

Eng. Angelo Zarrella PhD

#### Dissemination Level

PU	Public	
со	Confidential, only for members of the consortium (including the Commission Services)	х
CI	Classified, as referred to in Commission Decision 2001/844/EC	

## **Publishable Summery**

The easy drill technique of HYDRA provides boreholes up to 325 mm at depths of 80 – 100 m in all types of soil. Inspired on the heat basket & helix type of heat exchangers REHAU designed and produced some new prototypes of heat basket type GSHE which fit into borehole with a smaller diameter (< 350 mm) as needed for the standard product Helix©.

For the final decisions a development matrix was created in this report. The matrix has 4 sections with different observation points. The sections are production, material, installation and simulation. The basis for this matrix is the standard Helix© production. All observations in the Helix production receive the value 3. In cases where the development part is better than the Helix© production there is the value 2 or 1, if the methodology is worse than the standard Helix© there is the value 4 or 5.

The development with the lowest number is the best development of the matrix and will be preferred.

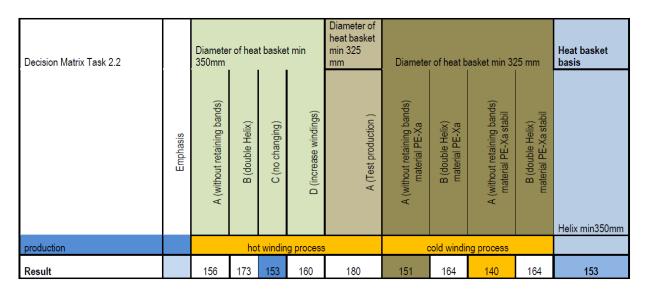


Table PS-1. Estimation cost matrix of the developed heat basket

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