According to the Al Kashi's theorem

So

(valid for both configurations)

(When the angle is implemented in the code, it is negative or positive)

Finally, the Cartesian coordinates of the foot are:

We define hip\_angle = ha and knee\_angle = ka

Knowing the position of the leg AE, we have:

We can define

* with

*or*

or

* or

Une image contenant diagramme

Description générée automatiquement

