Honey Badger Algorithm

Metaheuristics for Search & Optimization

Paper Details

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Why Honey Badger Algorithm?

The Honey Badger Algorithm is an efficient search strategy for solving optimization problems.

- Honey Badger Algorithm (HBA) is a new metaheuristic optimization algorithm inspired by the intelligent foraging behavior of honey badgers.
- HBA has been tested on 24 standard benchmark functions, CEC'17 test-suite, and four engineering design problems and has been found to be effective for solving optimization problems with complex search-space.
- HBA has been found to be superior to other methods in terms of convergence speed and exploration–exploitation balance.

Honey Badgers & Biological inspiration

- Honey Badger Algorithm (HBA) imitates the foraging behavior of honey badger.
- For locating food source, the honey badger either smells and digs or follows honeyguide bird. We call the first case as digging mode while the second as honey mode.
- In the prior mode, it uses its smelling ability to approximate prey location; when reaching there, it moves around the prey to select the appropriate place for digging and catching the prey.
- In latter mode, honey badger takes the guide of honeyguide bird to directly locate beehive.