

# Motion capture and data analysis systems



## Business need

The movement analysis tools currently available on the market, in addition to their particularly high costs, require dedicated spaces that are usually unsuitable for the subject/patient in order to monitor their movements, exercises and actions as naturally as possible.



## Solution overview

Using a marker-less Motion Capture system based on RGB or RGB-D sensors, the solution automatically analyses movements and exercises made by patients in the medical field, collecting data useful for doctors to formulate diagnoses, rehabilitation paths or analyses regarding the use of wheelchairs and other aids. Given its versatility, the solution lends itself to many applications in other fields (e.g. ergonomic analysis in industry and design, occupational medicine, analysis of sporting gestures, study of seating in the automotive sector).



## Key benefit

- Versatility (areas of application)
- Low costs
- Remote application
- Accident prevention

## Contacts

[caterina.rizzi@unibg.it](mailto:caterina.rizzi@unibg.it)

[daniele.regazzoni@unibg.it](mailto:daniele.regazzoni@unibg.it)

[andrea.vitali1@unibg.it](mailto:andrea.vitali1@unibg.it)

## Target

Sports clubs

Automotive

Hospitals and medical equipment manufacturers

Manufacturing companies, manufacturers of furniture, seating, etc.

## Development phase

0. Pre-seed

1. Research

### 2. MVP Testing

3. Patent request

4. Industrial scale-up

5. Ready for market launch

**Keywords**

3D

Medical

Motion capture