DEXYM

Infrastructure for Robot Learning

CONVERTING HUMAN VIDEO TO PHYSICAL AI DATA

Infrastructure for Robot Learning

Ego-Centric Video

Human Behavior Data for Robot Training

Multi-scenario ego-centric manipulation data, structurally parsed into multimodal datasets to drive Embodied AI learning and operations.

100K+
Hrs

15M+
Clips

260+
Categories

Next-Gen Capture Paradigm.

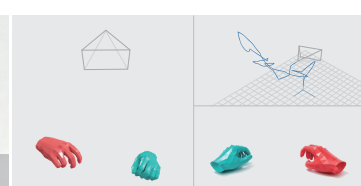
Behavior Reconstruction & Parsing

Multi-Stage Behavior Reconstruction: Full-stack parsing of long video clips—extracting trajectories and semantics—to restore continuous, structured representations for high-quality training data.

Full-Stack Automation

High-Fidelity Reconstruction

Semantic Operation Parsing



SynaCap-Ego Capture Device

Lightweight and designed for natural workflows. Effortlessly records comprehensive human operations for extended periods with zero constraints.

Locomotion Data

Video-driven kinematics generating structured motion data to reproduce multi-scenario locomotion for embodied training.

- Industry-Leading Monocular Accuracy
- High-Precision Binocular Tracking
- Massive Motion Datasets
- Cross-Embodiment Retargeting & Custom Formats

Human-Object Interaction (HOI) Data

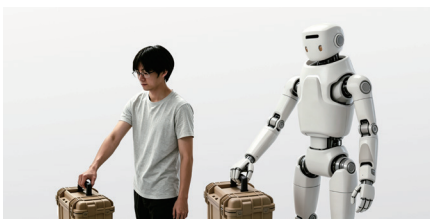
Structured HOI data parsing behaviors, contacts, and object state changes, providing learnable datasets for Embodied AI.

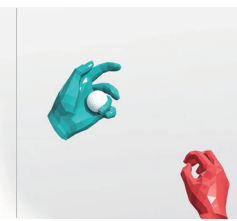
High-Fidelity Real-World HOI Capture

Fine-Grained 6D Pose Estimation

Full-Dimensional Object State Tracking

Accelerated Robot Learning





Extended Datasets

Teleoperation combined with simulation to generate composite data to drive closed-loop training for scalable, precise manipulation.

Data Augmentation

Sim-Teleop Data

Real-Robot Teleop Data

Immersive XR Teleop (UMI)