Ergonomics

Privacy Protection in Our Industrial Ergonomics Software

Our Industrial Ergonomics software is designed with privacy at its core. We use a multi-layered approach to ensure operators' personal information remains protected throughout the entire workflow—from video capture to data analysis.

1. Privacy-First Video Capture Options

When users upload videos for ergonomics analysis, they are presented with privacy-enhancing options:

- **Face blocking technology:** Operator faces are automatically detected and obscured with black circles for the entire video duration.
- **Full video blurring:** The entire video is blurred while preserving movement patterns required for analysis.

These options ensure that no identifiable visual information is captured or retained.

2. Secure and Private Data Processing

Our system processes all data in secure, isolated environments with privacy protections applied before analysis begins:

- Only **biomechanical data** (such as joint positions and angles) is extracted.
- No personal visual information is accessed or stored.
- Videos with privacy settings are **automatically deleted** from all servers once processing is complete.
- The system retains only anonymized ergonomic assessment data.

3. Protecting User Identity

We implement several measures to prevent user identification:

- **Visual anonymization**: Face blocking and video blurring technologies make visual identification impossible even during the analysis phase.
- **Decoupling of identity and analysis**: The system associates ergonomic data with job tasks, not with individual operators.
- **Technical safeguards**: The algorithms cannot reverse-engineer personal identity from the anonymized biomechanical data points.

4. **Task-Based, Not Person-Based, Analysis**
   Our software focuses solely on assessing tasks, not individuals:
   - **Biomechanical focus:** The pose estimation models track only the skeletal structure and joint angles relevant to ergonomic analysis – no facial or personal details are considered.
   - **Task-centric data model:** All insights are tied to the job function being performed, not the person performing it.
   - **Standardized metrics:** We use universally accepted ergonomic assessment tools (RULA, REBA, NIOSH) to ensure objectivity.
   - **Consistent results regardless of privacy settings:** Analysis outcomes remain the same whether or not privacy settings (face blocking or blurring) are enabled.
   - **Focus on workplace improvement:** All outputs and recommendations center on task modification and workplace design, not on individual operator performance.

5. **System-Wide Privacy Protections**
   Our comprehensive privacy safeguards extend across the entire system:
   - **Privacy by design:** Privacy controls are built into the core architecture, not added as afterthoughts.
   - **Zero-storage policy:** When privacy options are enabled, videos are automatically deleted from all servers after processing.
   - **Encrypted processing:** All data handling is done within encrypted environments.
   - **Restricted access:** Strict role-based access controls ensure that only authorized personnel can view anonymized data.
   - **User transparency and control:** Visual indicators within the interface confirm when privacy features are active.

Our Industrial Ergonomics software is engineered to protect operator privacy while delivering actionable ergonomic insights to improve workplace safety and efficiency. By design, our system ensures that personal identity is never part of the analysis, giving organizations confidence that employee privacy is safeguarded at every step.