

Ali Mohamed

Backend Software Engineer

Egypt | +20 120 525 9932

terminalexel@gmail.com | linkedin.com/in/Aliexe-code | github.com/Aliexe-code

SUMMARY

Backend Software Engineer specializing in distributed systems, cloud infrastructure, and high-performance Go services. Shipped production contributions to Docker (**docker-agent**) and Kubernetes SIG (**agent-sandbox**). Focused on low-level concurrency, network protocols, and reliable distributed architectures.

TECHNICAL SKILLS

Languages: Go, SQL, Python, TypeScript

Backend & Cloud-Native: gRPC, REST, Protocol Buffers, WebSockets, NATS, Fiber, Echo

Databases & Storage: PostgreSQL, Redis, MinIO (S3), MongoDB, SQLite

DevOps & Infrastructure: Docker, Kubernetes, Linux, Git, CI/CD, AWS (EC2, S3)

LANGUAGES

Arabic: Native **English:** Professional working proficiency

EXPERIENCE & OPEN SOURCE

- gofakes3** Open Source Contributor | Go, BoltDB [PR #114](#) Jul 2026
- Fixed `ListBucket` pagination in the `s3bolt` backend to honor `page.Marker` and `page.MaxKeys`, aligning behavior with the `s3mem` backend
 - Implemented marker-based cursor seeks via `c.Seek()` and proper `IsTruncated` / `NextMarker` signaling for paginated listings
 - Shipped in `gofakes3` v1.2.0, now used in production by downstream Go projects
- Docker — docker-agent** Open Source Contributor | Go, AI Agents [PR #1807](#) Feb 2026
- Resolved a user-reported bug (#1776) where alloy-model sidebar display showed the wrong provider, as `formattedModel` was derived from the configured `modelID` instead of the actually used provider
 - Refactored stream handling to forward the real `providerID` to `handleStream`, ensuring `AgentInfo` events carry the correct provider/model format
- Kubernetes SIG — agent-sandbox** Open Source Contributor | Go, CI/CD [PR #332](#) Feb 2026
- Added GitHub Actions workflow validation using `actionlint` to surface YAML errors before merge
 - Delivered a `dev/tools/lint-workflows` script, a CI presubmit, and a `make lint-workflows` target to make the check reproducible locally

PROJECTS

- ChatX — Real-Time Chat Platform** Go, WebSockets, NATS, PostgreSQL [GitHub](#) Jan 2026
- Engineered horizontally scalable chat platform using an event-driven hub pattern with `sync.RWMutex` for high-concurrency workloads
 - Built multi-server architecture with NATS pub/sub broker for cross-node routing and stateless horizontal scaling
- Secure Document Exchange Portal** Go, Fiber, PostgreSQL, Redis, MinIO [GitHub](#) Oct 2025
- Architected encrypted document exchange platform using AES-256-GCM envelope encryption for sensitive data
 - Implemented Redis caching tier for metadata queries, reducing database load and latency for frequent lookups

EDUCATION

Zagazig University

Bachelor of Engineering in Computers and Systems

Sharqia, Egypt

Sep 2020 – Aug 2025