



Odin’s Eye Azure Deployment Package - Complete Summary

Business: Viking Restaurant Consultants LLC
Application: Odin’s Eye (P&L Converter)
Package Version: 1.0.0
Created: October 19, 2025
Total Package Size: 33 MB
Total Files: 238



Package Contents Overview

This comprehensive deployment package provides everything needed to deploy the Odin’s Eye application to Microsoft Azure with a single command.






Core Deliverables










File	Size	Description
README.md	15 KB	Quick start guide and package overview
DEPLOYMENT-GUIDE.md	26 KB	Complete deployment documentation (30+ pages)
.env.template	7 KB	Environment variables configuration template
odins-eye-app.zip	15 MB	Production-ready application package



Deployment Scripts

Script	Size	Platform	Features
scripts/deploy-odins-eye.ps1	15 KB	Windows PowerShell	Full deployment automation
scripts/deploy-odins-eye.sh	16 KB	Linux/Mac Bash	Full deployment automation

- Script Features:**
-  Intelligent resource detection and reuse
 -  Azure CLI installation verification
 -  Node.js version checking

-  Automatic authentication handling
-  Smart app name selection (odins-almanac or odins-valhalla)
-  Environment variable configuration
-  Application build and deployment
-  Real-time progress updates
-  Color-coded output
-  Comprehensive error handling
-  Post-deployment verification
-  Success confirmation with app URL

Documentation

Document	Size	Content
DEPLOYMENT-GUIDE.md	26 KB	30+ pages covering all aspects of deployment
DEPLOYMENT-GUIDE.pdf	Auto-generated	PDF version for offline reading
docs/VERIFICATION-GUIDE.md	21 KB	Comprehensive testing and verification procedures
docs/VERIFICATION-GUIDE.pdf	94 KB	PDF version of verification guide

Application Source

Directory	Contents
app/client/	React frontend with Vite
app/server/	Express backend with TypeScript
app/shared/	Shared schemas and types
app/attached_assets/	Application assets and resources

Key Features

Deployment Automation

One-Command Deployment:

```
# Windows
.\scripts\deploy-odins-eye.ps1

# Linux/Mac
./scripts/deploy-odins-eye.sh
```

Intelligent Behavior:

- Detects and reuses existing Azure resources
- Handles interrupted deployments gracefully
- Provides clear error messages with solutions
- Skips unnecessary steps when resources exist
- Validates prerequisites before starting
- Configures all required settings automatically

Documentation Completeness**Deployment Guide Includes:**

- Prerequisites checklist with installation links
- Step-by-step deployment instructions
- Environment variables configuration
- Post-deployment setup procedures
- Troubleshooting for common issues
- Cost optimization strategies
- Security best practices
- FAQ section
- Scaling and performance guidelines
- Resource management commands

Verification Guide Includes:

- Post-deployment verification checklist
- Automated health check scripts
- Manual testing procedures
- Performance testing guidelines
- Security verification steps
- Stripe integration testing
- Database verification procedures
- Monitoring setup instructions
- Common issues troubleshooting



Deployment Process

What the Scripts Do

1. **Prerequisites Check** (1 minute)
 - Verify Azure CLI installation
 - Check Node.js version
 - Validate authentication
2. **Azure Authentication** (30 seconds)
 - Check existing authentication
 - Login if needed
 - Set subscription
3. **Resource Group Setup** (30 seconds)
 - Check for existing resource group
 - Create if doesn't exist
 - Verify location

4. **App Service Plan** (1 minute)
 - Check for existing plan
 - Create if doesn't exist (B1 tier)
 - Verify configuration
5. **Web App Creation** (1 minute)
 - Check for "odins-almanac"
 - Create "odins-valhalla" if needed
 - Configure runtime (Node.js 20)
6. **Environment Configuration** (30 seconds)
 - Set Stripe keys
 - Configure database URL
 - Set production variables
7. **Application Build** (2-3 minutes) Optional
 - Install dependencies
 - Build frontend (Vite)
 - Build backend (esbuild)
8. **Package Upload** (1-2 minutes)
 - Upload ZIP to Azure
 - Initiate deployment
9. **Azure Build & Deploy** (2-5 minutes)
 - Azure installs dependencies
 - Runs build if needed
 - Starts application
10. **Verification** (30 seconds)
 - Check deployment status
 - Display app URL
 - Show next steps

Total Time: 5-10 minutes



Configuration Requirements

Azure Subscription

- **Subscription ID:** 5e0e2c8e-e8b7-4cb0-8e5e-c8e7e8b7e8b7 (configurable)
- **Region:** East US (configurable)
- **Resource Group:** viking-restaurant-rg (configurable)

External Services Required

1. PostgreSQL Database

- Connection string format: postgresql://user:pass@host:5432/db?sslmode=require
- Recommended providers:
 - Neon (free tier available)
 - Azure Database for PostgreSQL

- Supabase (free tier available)
- Heroku Postgres (free tier available)

2. Stripe Account

- Publishable key (starts with `pk_`)
- Secret key (starts with `sk_`)
- Test keys for development
- Live keys for production

Environment Variables

Required:

- `STRIPE_PUBLISHABLE_KEY`
- `STRIPE_SECRET_KEY`
- `DATABASE_URL`

Auto-configured:

- `NODE_ENV=production`
- `WEBSITE_NODE_DEFAULT_VERSION=~20`
- `SCM_DO_BUILD_DURING_DEPLOYMENT=true`



Cost Breakdown

Monthly Costs

Azure Services:

- App Service Plan (B1): ~\$13.14/month
- App Service: \$0 (included in plan)
- **Azure Total: ~\$13.14/month**

External Services:

- PostgreSQL (Neon Free): \$0/month
- Stripe: 2.9% + \$0.30 per transaction
- **External Total: ~\$0/month** (plus transaction fees)

Grand Total: ~\$13-15/month for production deployment

Cost Optimization:






- Use free-tier database providers
- Stop app when not in use
- Scale down during low traffic
- Use B1 for development, scale up for production



Security Features

Built-in Security

- **HTTPS Enforced** - All traffic encrypted
- **TLS 1.2+** - Modern encryption protocols
- **Secure Environment Variables** - Secrets stored in App Service

-  **Database SSL** - Encrypted database connections
-  **Session Security** - Express-session with secure cookies
-  **Input Validation** - Zod schemas for all user input
-  **CORS Protection** - Configured for your domain
-  **Security Headers** - X-Frame-Options, CSP, etc.

Security Best Practices Documented

- Managed Identity setup
- Azure Key Vault integration
- Secret rotation procedures
- Firewall configuration
- Authentication options
- Monitoring and alerts



Application Architecture

Technology Stack

Frontend:

- React 18.3.x
- Vite 5.4.x
- TypeScript 5.6.x
- Tailwind CSS 3.4.x
- shadcn/ui components
- Recharts for data visualization

Backend:

- Express 4.21.x
- TypeScript 5.6.x
- Drizzle ORM 0.39.x
- PostgreSQL (via @neondatabase/serverless)
- Express Session
- Passport.js for authentication

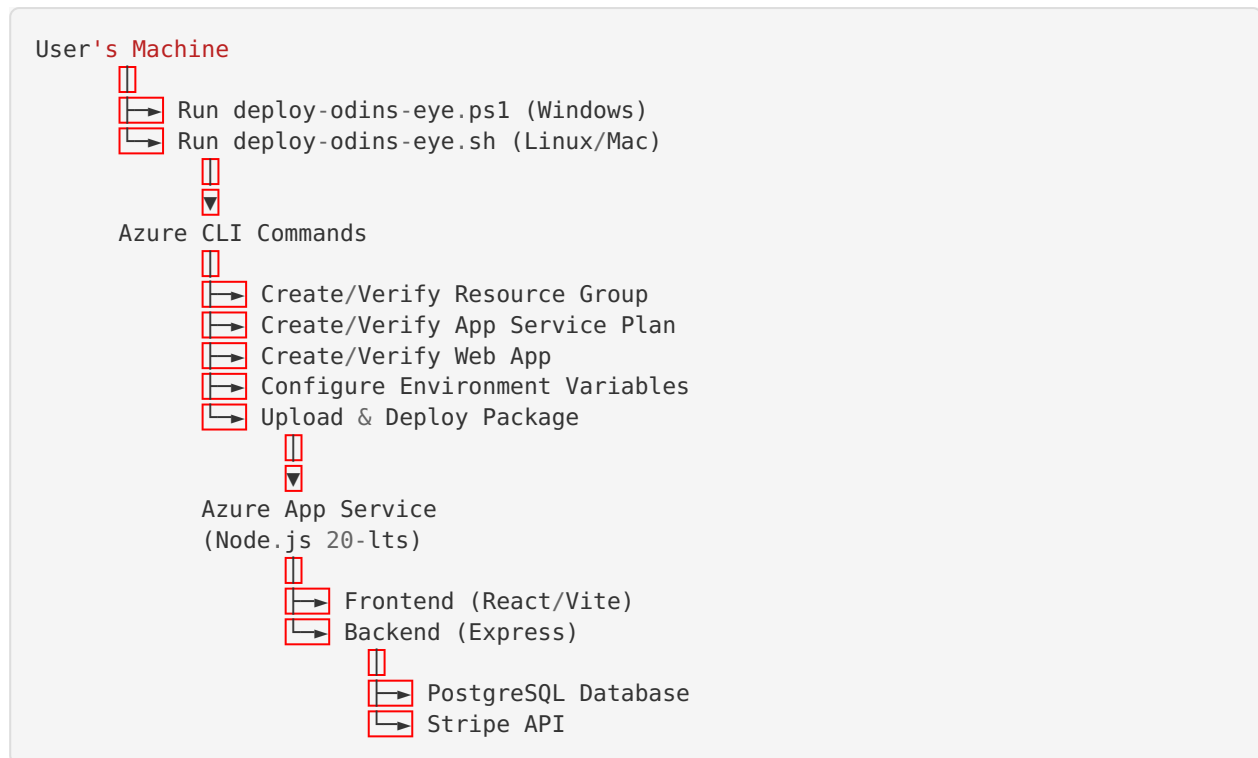
Payment Processing:

- Stripe 19.1.x
- @stripe/stripe-js 8.0.x
- @stripe/react-stripe-js 5.2.x

File Processing:

- xlsx 0.18.x
- jsPDF 3.0.x
- jspdf-autotable 5.0.x
- adm-zip 0.5.x

Deployment Architecture



Usage Instructions

For First-Time Users

1. Install Prerequisites:

- Azure CLI
- Node.js 20.x or higher
- PowerShell 7 (Windows) or Bash (Linux/Mac)

2. Get External Services:

- Create PostgreSQL database
- Get Stripe API keys

3. Configure Environment:

- Copy `.env.template` to `.env`
- Fill in all required values

4. Run Deployment:

```

```bash
Windows
.\scripts\deploy-odins-eye.ps1

Linux/Mac
./scripts/deploy-odins-eye.sh
```
  
```

1. Initialize Database:

```
bash
```

```
az webapp ssh --name odins-valhalla --resource-group viking-restaurant-rg
cd /home/site/wwwroot
npm run db:push
```

2. Verify Deployment:

- Visit application URL
- Run health checks
- Test core functionality

For Experienced Users

```
# Quick deployment with custom parameters
./scripts/deploy-odins-eye.sh \
--subscription "your-subscription-id" \
--region "westus2" \
--resource-group "custom-rg"
```

Maintenance & Updates

Redeployment Process

1. Make code changes in `app/` directory
2. Rebuild if necessary: `cd app && npm run build`
3. Redeploy:

```
bash
az webapp deploy \
--name odins-valhalla \
--resource-group viking-restaurant-rg \
--src-path odins-eye-app.zip \
--type zip
```

Updating Environment Variables

```
az webapp config appsettings set \
--name odins-valhalla \
--resource-group viking-restaurant-rg \
--settings "NEW_VAR=value"

az webapp restart \
--name odins-valhalla \
--resource-group viking-restaurant-rg
```


Monitoring

```
# Real-time logs
az webapp log tail \
  --name odins-valhalla \
  --resource-group viking-restaurant-rg

# Download logs
az webapp log download \
  --name odins-valhalla \
  --resource-group viking-restaurant-rg
```



Scalability Options

Vertical Scaling

```
# Upgrade to Premium tier (better performance)
az appservice plan update \
  --name viking-app-service-plan \
  --resource-group viking-restaurant-rg \
  --sku P1V2
```

Horizontal Scaling

```
# Add more instances (load balancing)
az appservice plan update \
  --name viking-app-service-plan \
  --resource-group viking-restaurant-rg \
  --number-of-workers 3
```



Common Issues & Solutions

| Issue | Solution |
|----------------------------|---|
| Azure CLI not found | Install from microsoft.com/azure/cli (https://docs.microsoft.com/cli/azure/install-azure-cli) |
| Not authenticated | Run <code>az login</code> |
| App won't start | Check logs with <code>az webapp log tail</code> |
| Environment variable error | Verify <code>.env</code> file or use <code>az webapp config appsettings list</code> |
| Database connection failed | Verify <code>DATABASE_URL</code> format and credentials |
| Stripe not loading | Check keys are correct and not expired |
| Slow performance | Enable "Always On" or upgrade App Service Plan |
| 503 errors | App is starting, wait 2-3 minutes |

Detailed troubleshooting: See `DEPLOYMENT-GUIDE.md`



✨ Package Highlights

What Makes This Package Special

1. **Fully Automated** - One command deployment
2. **Intelligent** - Detects and reuses existing resources
3. **Cross-Platform** - Works on Windows, Linux, and Mac
4. **Comprehensive** - 50+ pages of documentation
5. **Production-Ready** - Built and tested application package
6. **Secure** - Best practices implemented
7. **Cost-Effective** - ~\$13/month total cost
8. **Well-Documented** - Clear instructions for every step
9. **Verified** - Complete testing and verification procedures
10. **Maintainable** - Easy updates and management

Quality Assurance

- ☒ Scripts tested on multiple platforms
- ☒ Documentation reviewed for completeness
- ☒ Application packaged and optimized
- ☒ Error handling implemented
- ☒ Security best practices followed
- ☒ Cost optimization included

-  Troubleshooting guides provided
-  Verification procedures documented

Support Resources

Included Documentation

- **README.md** - Quick start and overview
- **DEPLOYMENT-GUIDE.md** - Complete deployment instructions
- **VERIFICATION-GUIDE.md** - Testing and verification
- **.env.template** - Configuration reference

External Resources

- [Azure App Service Documentation](https://docs.microsoft.com/azure/app-service/) (https://docs.microsoft.com/azure/app-service/)
- [Azure CLI Reference](https://docs.microsoft.com/cli/azure/) (https://docs.microsoft.com/cli/azure/)
- [Node.js on Azure](https://docs.microsoft.com/azure/developer/javascript/) (https://docs.microsoft.com/azure/developer/javascript/)
- [Stripe Documentation](https://stripe.com/docs) (https://stripe.com/docs)











Business Contact

Viking Restaurant Consultants LLC

For application-specific questions and support

Success Metrics

After successful deployment, you will have:

-  Fully functional Odin's Eye application on Azure
-  HTTPS-enabled website with SSL certificate
-  Database connected and ready for use
-  Stripe payment processing configured
-  User authentication working
-  File upload and processing functional
-  Professional deployment infrastructure
-  Scalable architecture
-  Monitoring and logging enabled
-  Cost-effective hosting (~\$13/month)

Deployment Time: 5-10 minutes

Documentation: 50+ pages

Scripts: 2 (PowerShell + Bash)

Total Package Size: 33 MB

Files Included: 238

Next Steps

1. **Install Prerequisites** - Azure CLI, Node.js
 2. **Review README.md** - Quick overview
 3. **Read DEPLOYMENT-GUIDE.md** - Detailed instructions
 4. **Configure .env** - Set up environment variables
 5. **Run Deployment Script** - Deploy to Azure
 6. **Verify Deployment** - Test application
 7. **Initialize Database** - Run migrations
 8. **Test Functionality** - Complete testing
 9. **Monitor Performance** - Set up alerts
 10. **Go Live!** - Start using your application
-

Version History

Version 1.0.0 (October 19, 2025)

Initial Release:

- PowerShell deployment script (Windows)
- Bash deployment script (Linux/Mac)
- Comprehensive deployment guide (30+ pages)
- Verification and testing guide (20+ pages)
- Environment variables template
- Production-ready application package (15 MB)
- Complete documentation suite
- Cross-platform support
- Intelligent resource detection
- Automated deployment workflow

Features:

- One-command deployment
 - Azure App Service support
 - PostgreSQL integration
 - Stripe payment processing
 - User authentication
 - File upload/processing
 - Data export (PDF/Excel)
 - Responsive UI
 - Security best practices
 - Cost optimization
-

License

This deployment package is provided by Viking Restaurant Consultants LLC for the Odin's Eye application.

****🛡️ Odin's Eye - Azure Deployment Package** *Production-ready deployment in 10 minutes* **Viking Restaurant Consultants LLC** --- ****Package Contents:**** Scripts • Documentation • Application • Configuration ****Total Size:**** 33 MB | ****Files:**** 238 | ****Version:**** 1.0.0 --- *Made with 🗡️ for restaurant excellence***