

# SolidWorks Automation Suite - Troubleshooting Guide

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## Quick Diagnostics

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### System Health Check

Run these checks first:

1. **SolidWorks Status:** Is SolidWorks installed and licensed?
2. **Connection Status:** Can the application connect to SolidWorks?
3. **File Access:** Can the application read/write to configured folders?
4. **Dependencies:** Is .NET Framework 4.8 installed?

### Diagnostic Information

To get diagnostic info:

Help → About → Copy System Info

This provides:

- Application version
  - SolidWorks version
  - .NET version
  - OS version
  - Memory usage
  - Connected status
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## Common Issues

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### 1. Connection Issues

#### Problem: Cannot Connect to SolidWorks

##### Error Messages:


- "Failed to connect to SolidWorks"
- "SolidWorks not found"
- "COM Error: Class not registered"

##### Symptoms:

- Connection button stays disabled
- Application freezes when connecting
- Error dialog appears

##### Solutions:


#### Solution 1: Restart Both Applications

1. **Close** SolidWorks Automation
2. **Close** all SolidWorks instances
3. **Open** Task Manager  **End** any SW processes
4. Launch SolidWorks first
5. Launch SolidWorks Automation
6. Click "**Connect**"

### Solution 2: Run as Administrator

1. Right-click application shortcut
2. Select "**Run as administrator**"
3. Allow UAC prompt
4. Try connecting again

### Solution 3: Repair SolidWorks Installation

1. **Control** Panel  Programs **and** Features
2. Select SolidWorks
3. Click "**Repair**"
4. Complete repair process
5. Restart computer

### Solution 4: Check COM Registration

```
# Run in PowerShell as Admin
$swPath = "C:\Program Files\SOLIDWORKS Corp\SOLIDWORKS\SLDWORKS.exe"
& $swPath /regserver
```

## 2. Workflow Execution Issues

### Problem: Workflow Fails Immediately

#### Symptoms:

- Workflow starts then stops
- No steps execute
- Error in execution log

#### Solutions:

#### Check Workflow Validation

1. **Open** workflow editor
2. Look **for** validation errors (red X icons)
3. Fix invalid **steps**
4. **Save** **and** try again

#### Verify File Paths

1. Check all file paths in workflow **steps**
2. Ensure files exist
3. Use **absolute** paths, **not** relative
4. Check **for** typos

### Increase Timeouts

1. Edit workflow
2. **For** each **step**, increase timeout
3. Recommended: 300 seconds minimum
4. **Save** changes

## Problem: Some Steps Fail But Others Succeed

### Symptoms:

- Workflow partially completes
- Some steps marked as failed
- Error messages in step results

### Solutions:

#### Enable Continue on Error

1. Edit failing **step**
2. Check "**Continue on Error**"
3. **Save** workflow
4. Re-**run**

#### Add Retry Logic

1. Edit failing **step**
2. Set "**Retry Count**" to 3
3. **Save and** re-**run**

#### Check Step Dependencies

1. **Verify steps** execute in correct **order**
2. Check "**Depends On**" relationships
3. Ensure prerequisites are met

## 3. Performance Issues


### Problem: Application is Slow or Freezing

#### Symptoms:

- UI becomes unresponsive
- Operations take longer than expected
- High CPU or memory usage

#### Solutions:

##### Close Unnecessary Documents

1. In SolidWorks, **close** all documents
2. Keep **only** documents being processed
3. Use File  **Close All**

### Reduce Parallel Workflows

- Settings → Workflows
- Set "Max Parallel Workflows" to 1
  - Disable "Enable Parallel Execution"

### Increase System Resources

1. **Close** other applications
2. Check Task Manager **for** resource hogs
3. Consider upgrading RAM

### Clear Cache

- Settings → Performance
- Click "Clear Cache"
  - Restart application

## Problem: SolidWorks Becomes Unresponsive

### Symptoms:

- SolidWorks window frozen
- "Not Responding" in title bar
- Cannot interact with SolidWorks

### Solutions:

#### Wait for Operation to Complete

- Large assemblies can take time
- Check Windows Task Manager **for** activity
- **Wait** 5-10 minutes before forcing close

#### Disable Automatic Rebuild

- SolidWorks → Tools → Options
- System Options → Performance
  - Uncheck "Automatic rebuild"

## 4. File Access Issues

### Problem: Cannot Open Documents

#### Error Messages:

- "File not found"

- "Access denied"
- "File is read-only"

#### Solutions:

##### Check File Permissions

1. Right-click file → Properties
2. Security tab
3. Ensure your user has Read/Write
4. If not, click Edit → Add permissions

##### Check File is Not Open

1. Look for file in SolidWorks
2. Close if open
3. Check Task Manager for hidden SolidWorks instances

##### Verify Network Path

1. If file on network, check connection
2. Try accessing via File Explorer
3. Map network drive if needed

#### Problem: Cannot Save Files

##### Error Messages:

- "Failed to save document"
- "Disk is full"
- "Path not found"

#### Solutions:

##### Check Disk Space

1. Open File Explorer
2. Right-click drive → Properties
3. Verify free space > 1 GB
4. Clean up if needed

##### Check Output Folder Exists

- Settings → Paths
- Verify "Output Path" exists
  - Create folder if missing

##### Check Write Permissions

1. Navigate to output folder
  2. Try creating a test file
  3. If fails, check permissions
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## 5. Property Update Issues

### Problem: Properties Not Updating

#### Symptoms:

- Set property operation succeeds
- But property value unchanged
- No error message

#### Solutions:

##### Check Property Name

1. Property names are case-sensitive
2. **Verify** exact spelling
3. No extra spaces


##### Check Configuration

1. Specify correct configuration name
2. **Or** use "" **for** file-level properties
3. Check configuration exists

##### Force Rebuild

1. After setting property
2. Add "Rebuild Document" **step**
3. Re-**run** workflow

##### Manual Verification

1. **Open** document in SolidWorks
2. File  Properties
3. Check property manually
4. **If** there, may be display issue

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## 6. Export Issues

### Problem: Export Fails

#### Error Messages:

- "Export failed"
- "Invalid format"
- "Cannot create file"

#### Solutions:

##### Verify Format Support

Supported formats:

- PDF, DXF, DWG (drawings)
- STEP, IGES, Parasolid (parts/assemblies)
- STL (3D printing)

### Check Output Path

1. Ensure output folder exists
2. Check write permissions
3. **Verify** disk space

### Use Full File Path

Wrong: "export.pdf"  
 Right: "C:\Output\export.pdf"

## Problem: PDF Export is Blank

### Symptoms:

- PDF file created
- But content is blank or black

### Solutions:

#### Update Graphics Drivers

1. Visit GPU manufacturer website
2. Download latest drivers
3. Install **and** restart

#### Change PDF Export Settings

SolidWorks → Tools → Options

- System Options → Export
- PDF Options
- Try different settings

## 7. Installation Issues

### Problem: Installation Fails

#### Error Messages:

- "Installation failed"
- ".NET Framework required"
- "Insufficient permissions"

#### Solutions:

See [Installation Guide](#) (INSTALLATION\_GUIDE.md) for detailed troubleshooting.

Quick fixes:

1. Run installer as Administrator

2. Install .NET Framework 4.8
  3. Check disk space
  4. Disable antivirus temporarily
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## 8. Licensing Issues

### Problem: "SolidWorks License Error"

#### Symptoms:

- Connection succeeds initially
- Operations fail with license error
- SolidWorks shows license warning

#### Solutions:

#### Check SolidWorks License

SolidWorks → Help → Check Licensing

#### Restart License Service

Services → SolidWorks FlexNet Licensing Service  
- Right-click → Restart


#### Contact IT Support

- License may be expired
  - May need license server update
  - Check with IT department
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## Advanced Troubleshooting

### Enable Debug Logging

To get detailed logs:



1. **Open** Settings
2. Navigate **to** Advanced  **Logging**
3. Set **"Log Level" to "Debug"**
4. Click **"Apply"**
5. Restart application
6. Reproduce issue
7. Check **logs**

Logs location: %AppData%\SolidWorksAutomation\Logs\

### Check Event Viewer



Windows Event Viewer may have additional errors:



1. Press Win+X  Event Viewer
2. Windows Logs  Application
3. Look **for** errors from "SolidWorksAutomation"
4. **Note** error codes **and** messages

## Clean Reinstall

If all else fails:

1. **Export** settings **and** workflows
2. Uninstall application completely
3. Delete AppDataSolidWorksAutomation
4. Restart computer
5. Reinstall application
6. Import settings

## Error Codes

Common error codes and meanings:

Code	Meaning	Solution
E001	SolidWorks not found	Install SolidWorks
E002	Connection timeout	Increase timeout, restart SW
E003	File not found	Check file path
E004	Access denied	Check permissions
E005	Invalid parameter	Check step configuration
E006	Workflow validation failed	Fix validation errors
E007	Operation timeout	Increase step timeout
E008	COM error	Restart both applications
E009	Disk full	Free up disk space
E010	License error	Check SolidWorks license

# Getting Help

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## Before Contacting Support

Gather this information:

1. **System Info:** Help → About → Copy System Info
2. **Error Messages:** Screenshot or copy exact text
3. **Log Files:** From `%AppData%\SolidWorksAutomation\Logs\`
4. **Steps to Reproduce:** Exact steps that cause the issue
5. **Workflow File:** If workflow-related (export as JSON)

## Support Channels

### Email Support:

- Email: support@example.com
- Include all gathered information
- Response time: 24-48 hours

### GitHub Issues:

- <https://github.com/swiffc/Solidworks-Automation/issues>
- Search existing issues first
- Create new issue with template

### Community Forum:

- Coming soon
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## Known Issues

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### Current Known Issues

1. **Large Assembly Performance:** Assemblies with 1000+ components may be slow
  - Workaround: Process in smaller batches
2. **PDF Export Blank:** Some graphics cards produce blank PDFs
  - Workaround: Update graphics drivers
3. **Network Files:** UNC paths may timeout
  - Workaround: Map network drive

### Planned Fixes

These issues will be addressed in upcoming releases:

- Improved error messages
  - Better timeout handling
  - Enhanced logging
  - Performance optimizations
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## Self-Help Resources

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### Documentation

- [User Guide](#) (../UserGuide/USER\_GUIDE.md)
- [Installation Guide](#) (INSTALLATION\_GUIDE.md)
- API Documentation (Help → API Docs)

### Sample Files

- Sample workflows in: `C:\Program Files\SolidWorksAutomation\Workflows\Samples\`
- Example configurations in Settings

### Video Tutorials

- Coming soon

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