



# **Monkey Tower Mini™**

**Scaffolding in Seconds**

**[www.MonkeyTower.co.uk](http://www.MonkeyTower.co.uk)**

## ***Monkey Tower Mini User Manual***

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### ***Monkey Tower Ltd***

North Wing

Ingatstone Hall

Ingatstone

Essex CM4 9NS

01277 356172

[sales@monkeytower.co.uk](mailto:sales@monkeytower.co.uk)

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work methods (practices) and adequate facilities/ resources (including work equipment) are provided to eliminate or minimise risks, Work at Height Regulations 2005, Regulations 6, 7, 8 and Schedule 3 Part 2.

# Chapter 1

## Safety Rules

*Failure to obey the instructions and safety rules in this manual may result in death or serious injury.*

### Important Information

- This manual should remain with the machine at all times.
- If you have any questions contact Monkey Tower Ltd.

### Introduction

This instruction manual contains all the information required to correctly use the Monkey Tower Mini to provide collective measures enabling full compliance with the Work at Height Regulations 2005.

This Manual should be used in conjunction with a suitable Risk Assessment and Method Statement relative to the project to be undertaken, Work at Height Regulations 2005, Regulation 6(1). It must be noted that all employers have a responsibility to ensure that

### Do Not Operate Unless:

- You learn and practice the principles of safe machine operation contained in this operator's manual. You must:
  1. Know, understand and follow the safety rules in this Chapter.
  2. Follow the operating instructions, Chapter 2.
  3. Avoid hazardous situations, Chapter 4.
  4. Always perform a pre-operation inspection at the required interval, Chapter 3.
  5. Always perform function tests prior to use, Chapter 3.
  6. Inspect the workplace, Chapter 3.
- You read, understand and obey the manufacturer's instructions and safety rules including the safety and operator's manuals and machine decals.
- You use the machine as it was intended.
- You read, understand and obey employer's safety rules and worksite regulations.
- You read, understand and obey all applicable governmental regulations.
- You are properly trained and experienced to safely and competently operate the machine.

# Chapter 2

## Operating Instructions

### Fundamentals

The Operating Instructions section provides instructions for each aspect of machine operation.

It is the operator's responsibility to follow all the safety rules and instructions in the operator's manual.

If more than one operator is expected to use a machine at different times in the same work shift, each operator is expected to follow all safety rules and instructions in the operator's manual. That means every new operator should perform a pre-operation inspection, function tests and a workplace inspection before using the machine.

### Setup

- Check that work area is suitable according to the details given in the Site Inspection / Machinery Selection section of Chapter 3.

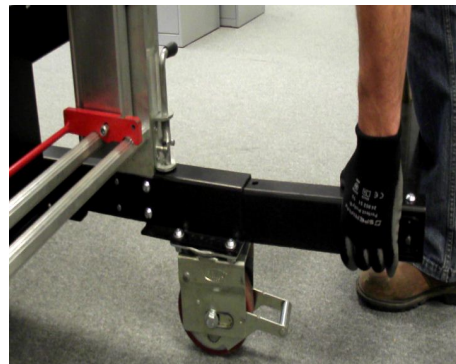
- Follow the Setup procedures in the Function Tests section.

### Raising Platform for Use

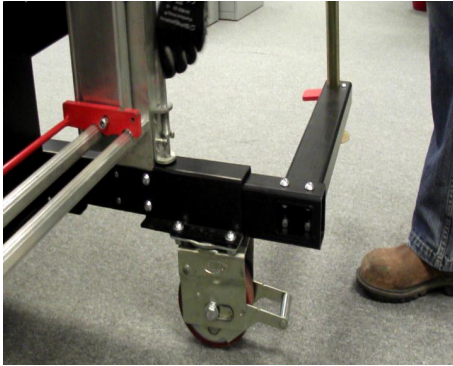
1. Position the machine directly below the desired work area. Make sure castors are locked in position by firmly pressing foot operated brake lever. (*If castors can spin on vertical axis the castor lock is not fully engaged.*)



2. Insert stabilising legs into back of Mini Monkey Monkey Tower.



3. Lock stabilising legs into position with the spring loaded leg pins at base of ladder.



4. Lower stabiliser leg upright by lifting spring loaded catch and letting upright drop. Make sure upright is in firm contact with the ground and release catch.



5. Check that the rung-lock bungee cord on ladders is loose by pulling the top end of the cable straight up and releasing.



6. Raise platform above desired height by lifting from side of platform and slowly

lower. Platform will lock into position resting on runglocks.



7. **⚠ DANGER** Check rung-locks are fully engaged. If locks are not engaged repeat steps 5 to 14.

## Climbing Ladder & Entering Platform

Before the ladder is climbed the following checks must be made each time:

- Check that the assembly is still correct and complete including stabiliser legs in position.
- Check that ladder locks are locked into place.
- Climb ladder using rungs and built in handles for handholds and maintaining 3 points of contact at all times.
- Climb through spring loaded door onto platform.



**▲ DANGER** *Do not extend the height of the platform by climbing on the guardrails or by using ladders, boxes etc.*

## Exiting and Lowering Platform

**▲ DANGER** *Do Not raise or lower platform or undo any locks when personnel are on Monkey Tower*

1. Open spring loaded door and exit platform via ladder.
2. Pull rung-lock bungee upwards to apply tension and sideways to lock the bungee in the plastic holder.
3. Raise platform approximately 10 cm (4") to disengage rungllocks and lower platform.

## Moving on Castors

The Monkey Tower can be moved on the the castors.

1. Unlock castors by lifting castor-lock by hand.
2. Move Monkey Tower Mini.

**▲ DANGER** Never move the Monkey Tower with workers on board.

**▲ DANGER** When platform raised do not move unless ground is smooth, level and free from drop-offs, ledges or debris.

**▲ DANGER** If windspeed is over 17mph (beaufort force 4) or ground conditions are poor fully lower the tower before moving.

Avoid sudden starts and stops. Keep personnel away from the machine when moving.

# Chapter 3

## Pre-Use Inspection

The pre-use inspection is a check on the correct functioning of the Monkey Tower Mini, operator competency and site conditions. The pre-use inspection is carried out in conjunction with the Inspection Record MTMIN-001 (a copy of which can be found on the back cover of this manual).

**Monkey Tower**  
Scaffolding in a Minute **MINI**

**Inspection Record MTMIN-001**

- Name and address of company for whom inspection carried out.
- Site address
- Location of the place of work.
- Time & Date of inspection
- Name and position of inspector

**Daily / Pre-use Inspection (see maintenance manual for more information)**

Serial Number	
Operator Manual Present	
Decals Present	
Damage, Dirt, Missing Parts, Corrosion, Unauthorised Changes	
Stabiliser Lev Function	
Door Function	
Lock Function	

- Daily / pre-operation inspection completed & recorded – Yes / No
- Site inspection / machinery selection complete – Yes / No
- Wind speed measured – Yes / No
- Operator familiarized & competent to use Monkey Tower Mini – Yes / No
- Details of any matter identified that could give rise to a risk to the health or safety of any person.
- Can work be carried out safely – Yes / No
- If work cannot be carried out safely name and position of person informed
- Details of any other action taken as a result of matters identified in 12 above.
- Details of any further action considered necessary.
- Name and position of the person making the report.
- Date and time report handed over
- Name and position of person receiving the report

The inspection regime given here is not exclusively for Monkey Tower but based on the HSE guidelines for work platforms (Scaffold Towers or MEWPs) <http://www.hse.gov.uk/pubns/l17.pdf> and the working at height regulations 2005

quired. If damage or any unauthorized variation from factory delivered condition is discovered, the machine must be tagged and removed from service. Repairs to the machine may only be made by a qualified service technician, according to the manufacturer’s specifications.

### Frequency of inspection

The pre-use inspection should be made at the following frequency:

- After installation in any position (note:- this does not mean every time that the Monkey Tower is moved on site)
- After exceptional circumstances which are liable to jeopardise the safety of the Monkey Tower or other work equipment.
- At suitable interval not exceeding every 7 days.

### Function Test

It is the responsibility of the operator to perform a function test. The function test is a visual inspection performed by the operator prior to each work shift. By following the order laid out here the function test can be performed whilst erecting a tower.

### Operators Manual Present

Be sure that the operator’s manual is complete, legible and readily accessible by users.



## Decals Present

Be sure that quick reference decal, ce badge and stabiliser leg warning decals are legible and in place.

## Damage, Dirt, Missing Parts, Corrosion, Unauthorised Changes

Check the following components or areas for damage, excessive dirt or contamination, improperly installed or missing parts and unauthorized modifications:

- Base components.
- Legs.
- Stabilizers.
- Ladders.
- Counterbalance cables (check for kinks, frays, abrasions).
- Pulleys.
- Cable attachments.
- Castors.
- Nuts, bolts and other fasteners.

Check the entire machine for:

- Dents or damage.
- Corrosion or oxidation.
- Cracks in welds or structural components, missing rivets.

Be sure that all structural and other critical components are present and all associated fasteners and pins are in place and properly tightened.

## Stabiliser Leg Function

Check the following function on all four of the stabiliser legs:

- Spring-loaded pins slide in and out of holes easily.
- stabilisers slide horizontally without undue force.
- Friction locks on upright hold upright in position.
- Spring on friction locks function.
- Castors function correctly (spinning and locking into position - caster should not spin around vertical axis when locked in position).

## Door Function

Check that the spring-loaded door swings back into position.

## Lock Function

Check that the locks on the ladders are in good condition and move in and out of position easily and that the bungee cables are in good condition.



## Site Inspection / Machinery Selection

The site inspection determines if the workplace is suitable for safe machine operation. Workplace inspection should be performed by a competent person prior to moving the machine to the workplace.

Be aware of and avoid the following hazardous situations:

- Low ground bearing capacity.
- Drop-offs or holes.
- Bumps and floor obstructions.
- Debris.
- Sloping surfaces.
- Unstable or slippery surfaces.
- Overhead obstructions.
- High voltage conductors.
- Inadequate surface support to withstand all load forces imposed by the machine.

Check that the Monkey Tower Mini is suitable for the intended job i.e. is there sufficient height to reach the workplace, can the workplace be reached from within the platform.

## Wind Speed Measurement

The maximum windspeed that a freestanding Monkey Tower shall be used in is 17mph (beaufort force 4). The windspeed should

be checked at the beginning of work and rechecked if any changes in the windspeed are noticed. The windspeed can be measured by use of an anemometer measuring the windspeed in two perpendicular direction. Alternatively the beaufort scale can be used (Beaufort force 4 is described by dust and loose paper being raised and small branches beginning to move. For Beaufort force 5 branches of a moderate size move and small trees in leaf begin to sway.)

Be aware that local windspeed conditions can be higher than surrounding areas especially in cases such as working between buildings, on the corners of buildings, open ended buildings etc.

## Chapter 4

# Hazardous Situations

### Fall Hazards

#### **⚠ DANGER**

- Do not use the machine as a personnel lifting platform. Monkey Tower is not to be used to lift or lower people.
- If occupants of the platform are required to wear personal fall protection equipment (PFPE) due to job site or employer rules, PFPE equipment and its use shall be in accordance with the PFPE manufacturer's instructions and applicable governmental requirements.
- Do not sit, stand or climb on the platform guard rails.
- Maintain a firm footing on the platform floor at all times.
- Keep the platform floor clear of debris.
- Ensure platform trapdoor is closed when working.

### Tip-over Hazards

#### **⚠ DANGER**

- Do not raise the platform unless the legs have been fully extended, lowered and locked, the casters are in full contact with the ground and the base is level.
- Do not impose a side load of more than 200N. Be aware of possible sideloads arising from work (pressure blasting, drilling etc.)
- Do not raise the platform unless the leg retainer pins are properly inserted through the leg and the base.
- Do not raise the platform unless the machine is on a firm surface and levelled.
- Do not level the machine with blocks or other means.
- Do not operate the machine in strong or gusty winds (max windspeed 17mph, beaufort 4).
- Do not increase the surface area of the platform or the load.
- Do not place ladders or scaffolding against any part of the machine.
- Do not use the machine on a moving or mobile surface or vehicle.
- Do not exceed the rated load capacity. (See Specifications Section).
- Do not adjust or remove the outriggers while the platform is occupied or raised.
- Do not place or attach overhanging loads to any part of this machine.

- Do not push off or pull toward any object outside the platform.
- Do not operate the machine near drop-offs, holes, bumps, debris, unstable or slippery surfaces or other possible hazardous conditions.
- Do not modify or alter the Monkey Tower without prior written permission from the manufacturer.
- Do not exceed the Safe Working Load - see specifications chapter.

## Electrocution Hazards

### **⚠ DANGER**

This machine is not electrically insulated and will not provide protection from contact with, or proximity to, electrical current.

- Keep away from the machine if it contacts energized power lines. Personnel must not touch or operate the machine until power lines are shut off.
- Keep away from electrical power lines and apparatus. Allow for machine movement and electrical line sway or sag, and be aware of strong or gusty winds.
- Do not use the machine as a ground for welding.
- Do not operate the machine during lightning or storms.

## Crushing Hazards

### **⚠ DANGER**

- Do not raise or lower the platform unless the area below is clear of people and obstructions.
- Keep hands and fingers away from potential pinch points.

## Collision Hazards

### **⚠ CAUTION**

- Check the work area for overhead obstructions or other possible hazards.
- Do not lower the platform unless the area below is clear of personnel and obstructions.
- Be careful when transporting on an incline.
- Be careful when moving by hand and avoid obstacles.

## Damaged Machine Hazards

### **⚠ DANGER**

- Do not use a damaged or malfunctioning machine.
- Conduct a thorough pre-operation inspection of the machine and test all functions before each work shift.

- Immediately tag and remove from service a damaged or malfunctioning machine. Any damaged parts or incorrect components shall not be used.

## **Routine Maintenance**

Details of routine maintenance can be seen in the Monkey Tower Maintenance Manual.

# Chapter 5

## Fault Finding

### Fault Finding Diagnostics

#### Platform Fails to Raise

If none of the solutions below fix the problem please refer to your Monkey Tower distributor or Monkey Tower Ltd.

- Check that there are no obstructions on the sliders or ladders.
- Check that platform is not loaded.

#### Platform Fails to Lower

- Check that rung-locks have been released. (Platform may need raising to release rung-locks).
- Check that rung-lock cables are intact.
- Check that there are no obstructions to the ladder, slider or brace-lock.

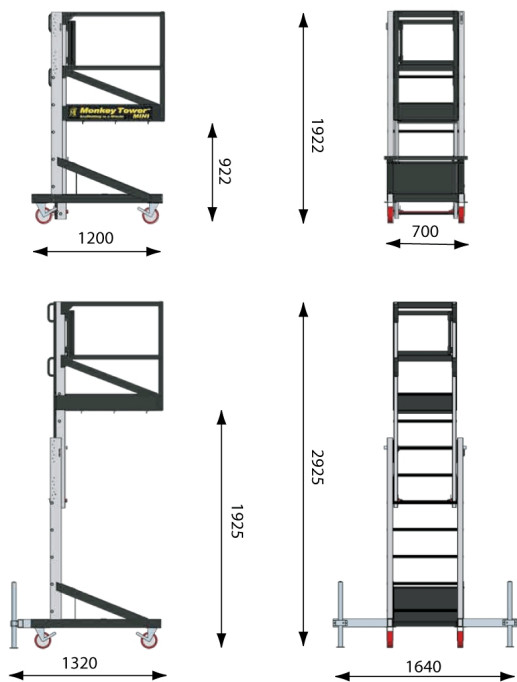
## Wind limits

Windspeed (mph)	Windspeed (Beaufort)	Action
0-17	0-4	Use as normal
0-21	5	Tie platform to solid structure or lower tower
21 +	6 +	Do not use and lower tower

# Chapter 6

## Specifications

Class - Class III Tower  
 Weight (minimum) - 90 kg.  
 Weight (working) - 110 kg.  
 Safe Working Load - 150 kg.  
 Max Platform Height - 1.95m.  
 Maximum Working Height - 3.95m.  
 Height Increment - 0.25m.









## Inspection Record MTMIN-001

1. Name and address of company for whom inspection carried out.

2. Site address

3. Location of the place of work.

3. Time & Date of inspection

5. Name and position of inspector

6. Daily / pre-operation inspection completed & recorded – Yes / No

8. Site inspection / machinery selection complete – Yes / No

9. Wind speed measured – Yes / No

10. Operator familiarized & competent to use Monkey Tower Mini – Yes / No

12. Details of any matter identified that could give rise to a risk to the health or safety of any person.

13. Can work be carried out safely – Yes / No

14. If work cannot be carried out safely name and position of person informed

15. Details of any other action taken as a result of matters identified in 12 above.

16. Details of any further action considered necessary.

17. Name and position of the person making the report.

18. Date and time report handed over

19. Name and position of person receiving the report

**Daily / Pre-use Inspection (see maintenance manual for more information)**

Serial Number	
Operators Manual Present	
Decals Present	
Damage, Dirt, Missing Parts, Corrosion, Unauthorised Changes	
Stabiliser Leg Function	
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