

## Precautions for Using ROBONANO $\alpha$ -0iB

- After turning on the power, be sure to execute origin return before use.
- In the S axis mode, do not use the machine at a speed exceeding 200 rpm.  
When a speed of 200 rpm or more is required, use the lathe spindle.
- **The total weight of jigs and workpieces mounted on the B axis must not exceed 20 kg.  
The total weight of jigs and workpieces mounted on the C axis must not exceed 10 kg.**
- Be sure to mount/dismount a jig or workpiece to the B /C axis while the emergency stop is released, and the setting mode is ON.
- When using the air turbine spindle, correct dynamic balance regardless of tool type.  
Also, be sure to wear protective glasses during dynamic balance adjustment.
- Before dismounting the air turbine spindle or lathe spindle, check that the spindle is stopped completely.
- **If possible, turn off the machine power during non operation periods, such as weekends and summer/winter holidays.**
- When an alarm occurs, contact FANUC immediately.

### Check items before using the machine

- Check that the air supply pressure, temperature inside the temperature-controlled chamber, and machine temperature are in the normal state.
- Check the air temperature controller for abnormality and the air filter for contamination.

## Precautions for Use (During Holidays)

- Remove jigs and tools on the B axis and C axis face plates.  
If the machining setup cannot be changed, fix the C and B axes with a magnet in the setup available state, and secure a distance between a tool and workpiece as much as possible.
- Remove cutting fluid and chips on the machine main unit, B axis and C axis face plates, air turbine spindle, angle rest, etc. and clean these devices carefully. **Wipe out with a paper wiper within arm's reach.**
- Move the X and Z axes to the area around the center of the table. It is safer to move the Y axis to the lower end of stroke.
- Cause an emergency stop and turn off the NC power. Turn off the main breaker of the NC locker as well.
- **Do not turn off the air conditioner power and air temperature controller power.**
- **Never stop air supply to the ROBONANO main unit.**
- Be sure to close the waterproof cover and rotary door.
- Organize a system for prompt recovery from air stoppage due to a power failure, some kind of trouble in the air compressor, etc. during holidays.  
Do not turn on the air temperature controller power until air supply is resumed.  
**In the event of stoppage of air supply to ROBONANO, never touch the machine.**
- **When the machine operation is resumed after holidays, check the temperature inside the temperature-controlled chamber, machine temperature, and air supply pressure for abnormality.**
- Turn on the power in the emergency stop state and check for abnormalities such as alarm display.
- Release the emergency stop and check for abnormalities such as alarm display. Move each axis in the positive and negative directions slightly by manual handle feed and check that the current value is normal with the load meter display before use.

## Precautions for Using ROBONANO (During Power Failure)

- Remove jigs and tools on the B axis and C axis face plates.  
If the machining setup cannot be changed during a power failure, fix the C and B axes with a magnet in the setup available state, and secure a distance between a tool and workpiece as much as possible.
- Remove cutting fluid and chips on the machine main unit, B axis and C axis face plates, air turbine spindle, angle rest, etc. and clean these devices carefully. **Wipe out with a paper wiper within arm's reach.**
- Move the X and Z axes to the area around the center of the table. It is safer to move the Y axis to the lower end.
- Cause an emergency stop and turn off the NC power. Turn off the main breaker of the NC locker.
- Be sure to close the waterproof cover (or medium pack) and rotary door.
- **Turn off the air temperature controller power. Never touch the machine during a power failure.**
- After recovery from a power failure, start air conditioning of the temperature-controlled chamber and air compressor promptly.  
Turn on the air temperature controller power after supplying air.
- **Check the temperature inside the temperature-controlled chamber, machine temperature, and air supply pressure (this should be the same as the value before power failure) for abnormality.  
Check that the machine temperature is the same as that in the normal machining. If not, leave it until the machine temperature returns to the normal state.**
- **Turn on the power in the emergency stop state and check for abnormalities such as alarm display.**
- Release the emergency stop and check for abnormalities such as alarm display. Move each axis in the positive and negative directions slightly by manual handle feed and check for abnormalities with the load meter display before use.
- Never touch the air pressure regulating valve during a power failure.