GOOD TECH
INSTRUMENTS CO., LTD.

SMS-RC

Rotating machinery vibration analyzer

Predictive maintenance
Rotor Care Solution

All sectors: pump, compressor, motor, etc.

- **Easy to carry**：Light weighted portable analyzer
- **Easy to operate**： 2-step simple setting
- **Easy to understand**：Result in color signal display

IP65 | -10~50°C | 128GB | FULLHD 1080p

Sleek UI + Smooth UX = Extraordinary Analyzer:

- **Smooth the operation process:** Eliminating the conventional wizard operation, SMS-RC’ s touch panel allows users to perform inspection in a more intuitive way, with no button function learning. Just follow built-in operational guidance, within max. 2 steps, users can finalize the settings without a sweat.
- **Prepared for the unexpected:** SMS-RC is an IP65 certified, rugged tablet type of analyzer, designed for all unexpected found in industrial environments. Total dustproof, water drop proof, wide temperature operation.
- **10” widescreen & FHD display**
- **Best computing ability ever:** PC-based SW enables a deeper algorithm, precise measurement & analysis right on site, with no additional post analytics SW.
- **Unlimited measurements storage:** micro SD card supports up to 128GB.

Order info / Anatomy

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Order Option 1 SMS-RC Full package	◦ SMS-RC SW license x1 ◦ Accelerometer accessory x1 ◦ 10" industrial tablet x1
Order Option 2 SMS-RC Acccelerometer kit	◦ SMS-RC SW license x1 ◦ Accelerometer accessory x1

Supporting tablet

① Power button
② Volume control
③ Power indicator (LED)
④ Input/output port:USB3.0 micro HDMI
⑤ DC - input jack
⑥ SD + SIM port

Accelerometer accessory

Sensor transmission line (2 meters) x 1
USB DAQ (Type A and micro type convertible) connector cable x 1
Vibration sensor (100 mV/g) (operating temperature：-54°C~121°C) x 1
Magnetic sensor base x 1
Probe x 1
Carrying case x 1

Function & Advantage

To solve the above pain points and to achieve the above purpose, the **Unique Feature Portfolio** of SMS-RC is as below:

1. **Machine holistic health indicator: ISO 20816 criticality**
2. **Machine unbalance indicator: ISO 1940 G level**
3. **Shock pulse detection: vibration value in real-time, average, maximum 3 aspects**
4. **FFT for common characteristic analysis (misalignment, unbalance, looseness, shaft bending, fluid turbulence, etc.)**
5. **TWF for bearing related faults(Lubrication, Damaged Bearing)**

Advantages of SMS-RC:

1. **Least product training need**
2. **Immediate ROI**
3. **Precise measurement and analysis**
4. **User friendly**
5. **Affordable budget**

4 functions, All in one

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SMS-Rotor Care

ISO 20816, 10816 health indicator, FFT, vibration value

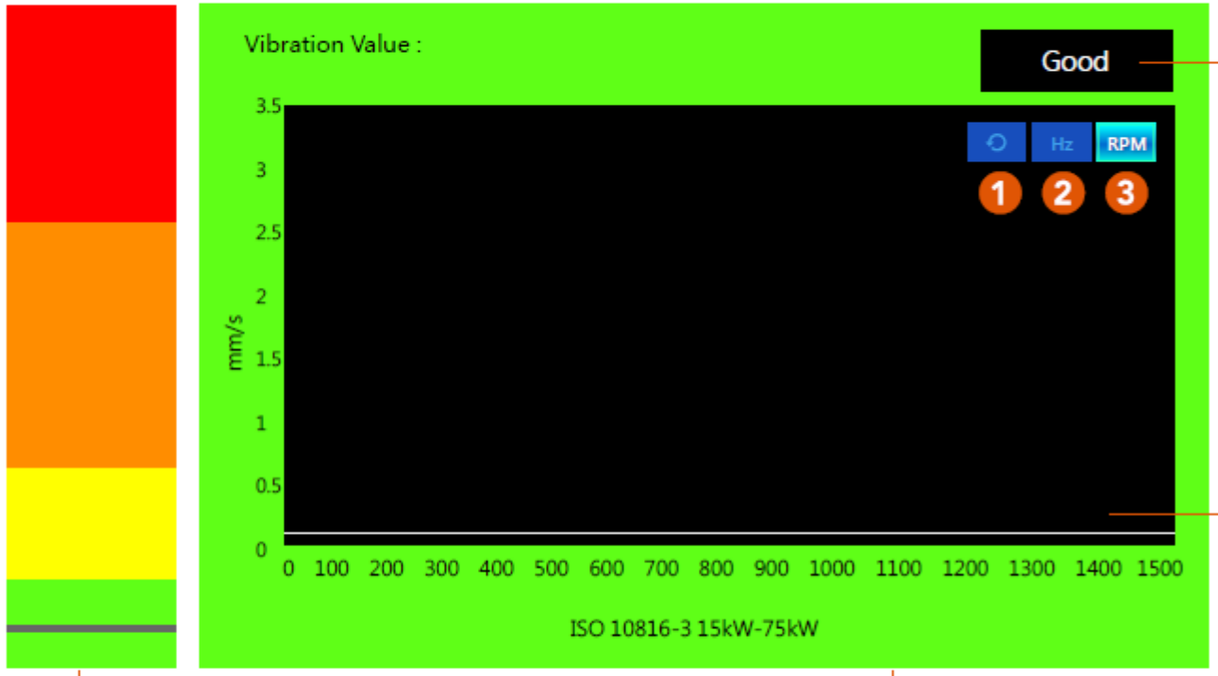
ISO 1940 Result of G level

TWF & FFT

Triple-algorithm of Real-time, Average, Maximum vibration values, views in between Acceleration, Velocity, and Displacement

UI of Rotor Quality

Rotor Quality Function Description



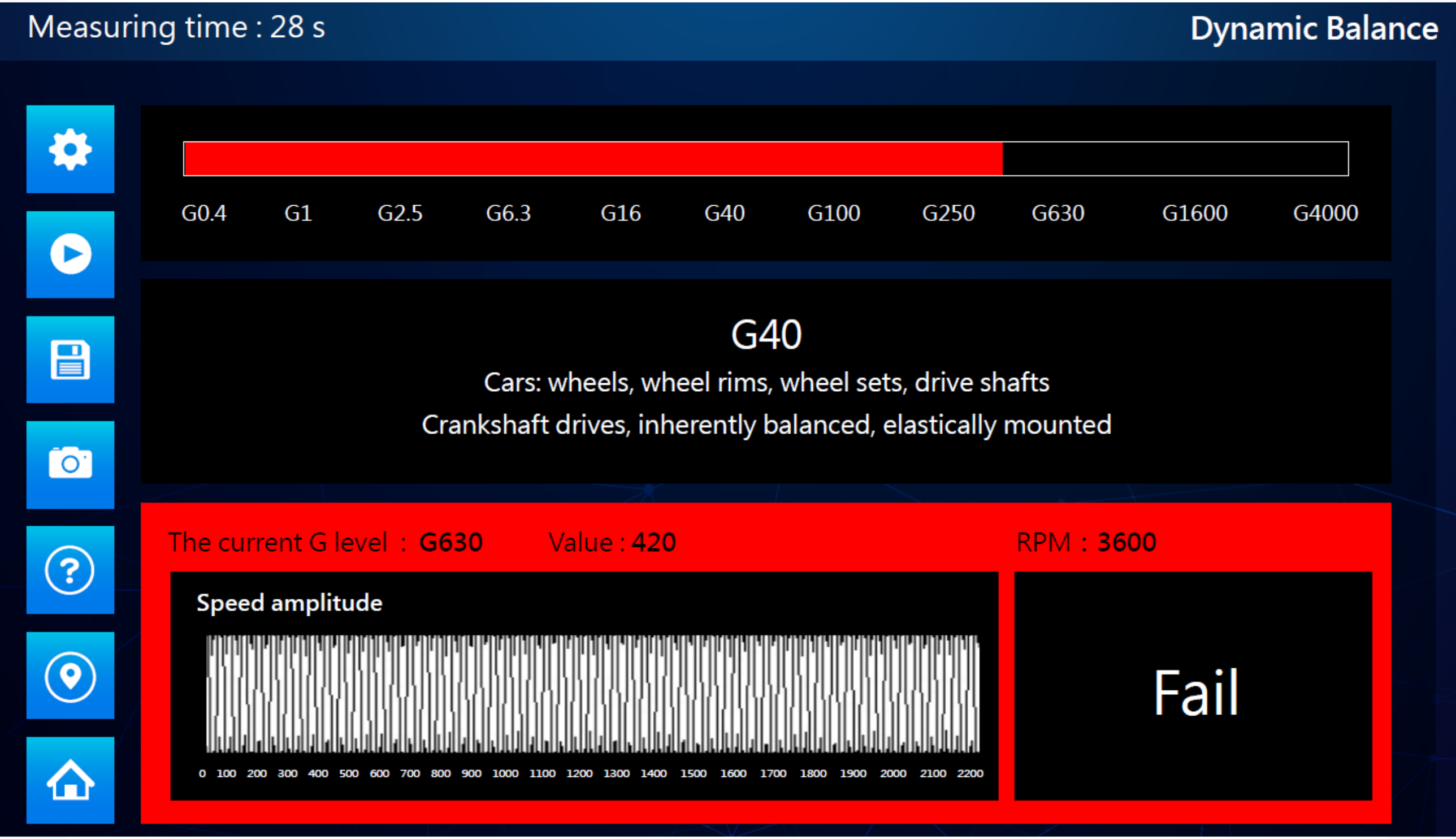
Device status : Good / Satisfactory
Unsatisfactory / Unacceptable

1. Restore after zoom in
2. Select Hz unit
3. Select RPM(CPM) unit

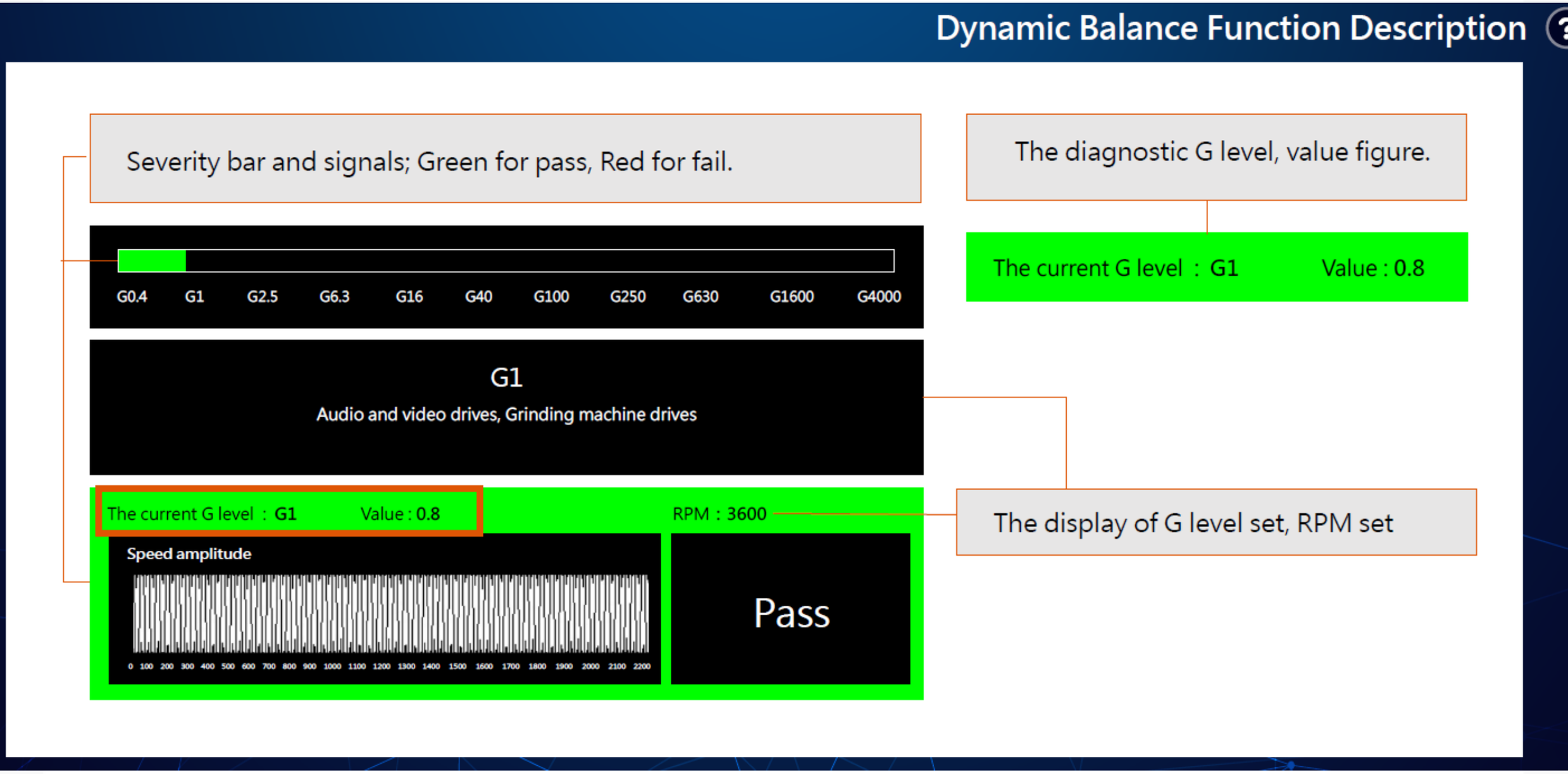
FFT chart

- Good : New machinery, excellent vibration quality, no specific deadline.
- Satisfactory : Acceptable vibration value, the machine can be used for a long time, there is no specific time limit.
- Unsatisfactory : Machine hasn't been used for a while. Maintenance or repair is needed.
- Unacceptable : Immediate repair is recommended.

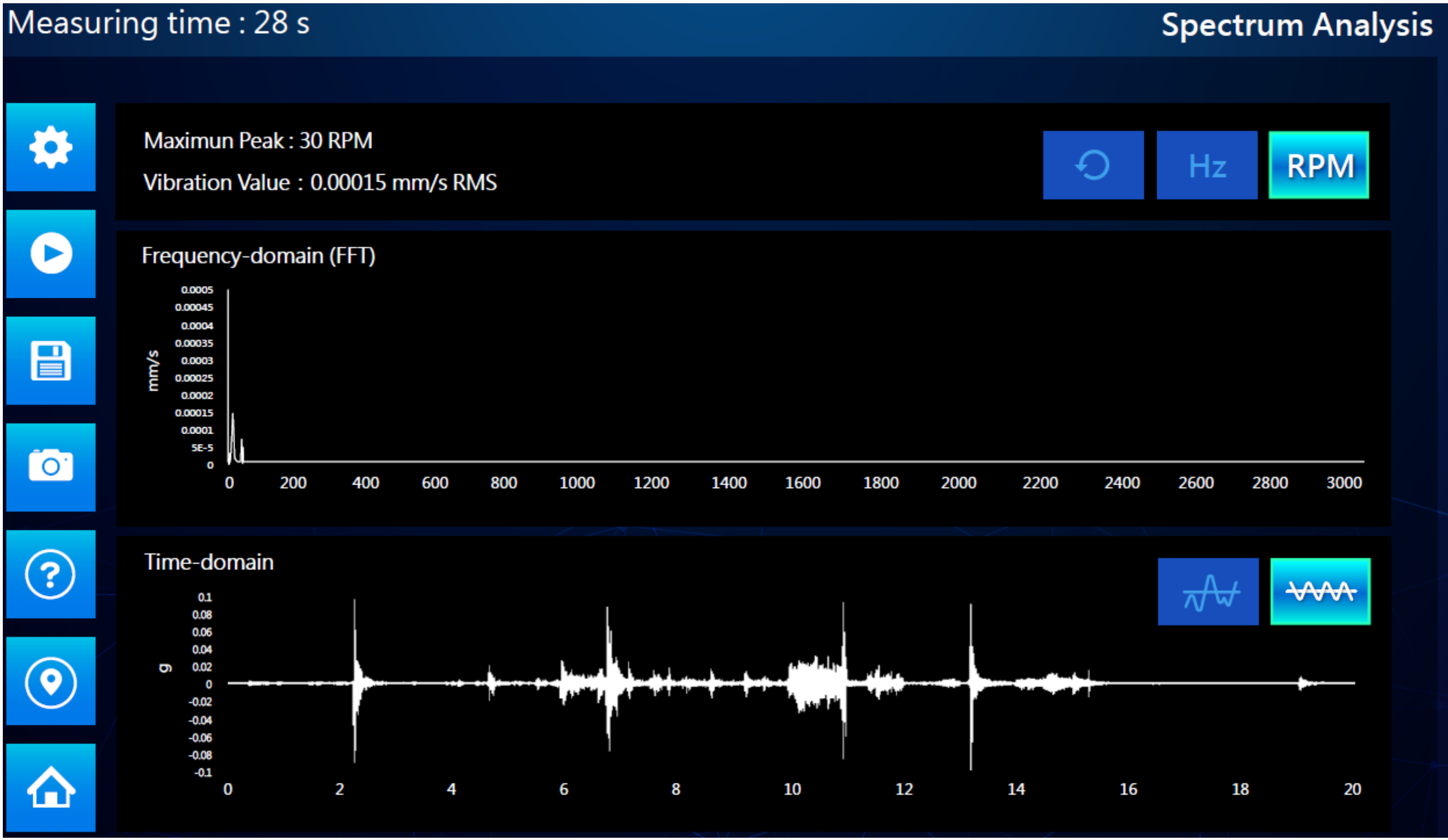
UI of Dynamic Balance



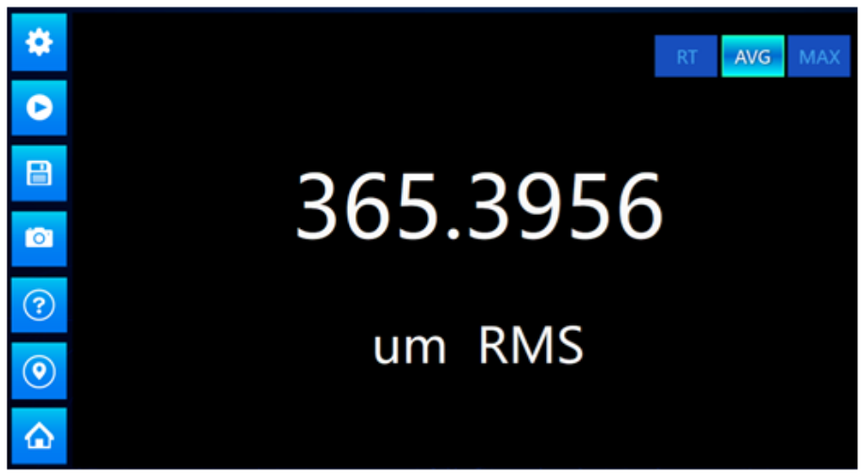
UI of Dynamic Balance

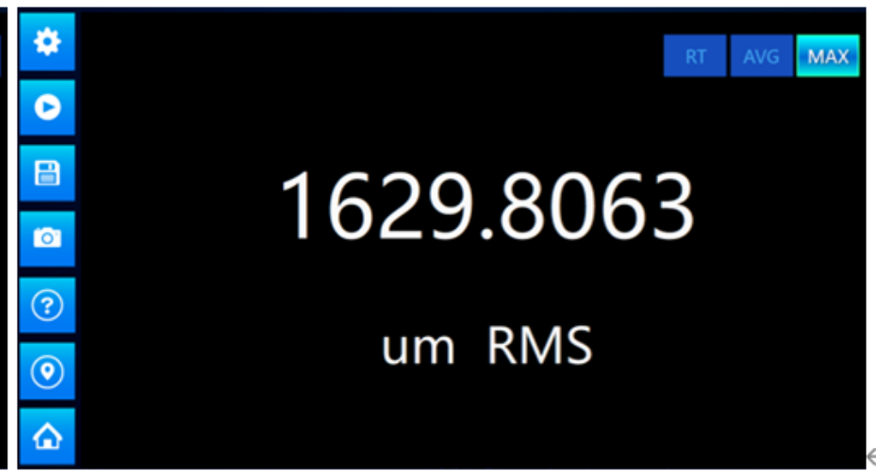


UI of Spectrum Analysis



UI of Vibration Meter





It’s never easy to capture shock pulses cause they can occur out of surprise with no rule at all. The average result of FFT will wash away random impact characteristics of bearings. **An alternative analytics method of C.F.(crest factor)** to identify shock pulse without machine knowledge.

Simply compare the max with the average result, and you can easily tell whether your machine has a shock pulse or not. If the max value is way beyond the average value(at least twice bigger than average value), then the answer is obviously that a shock pulse is detected.

Result above shows shock pulse has been detected. Because the max value of 1629.8063 is way beyond average value 365.3956.

-Real-time value is 541.1157 um RMS

-Average value is 365.3956 um RMS

-Maximum value is 1629.8063 um RMS

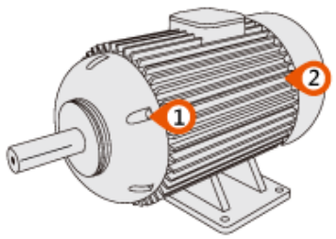
ISO regulations & vibration value

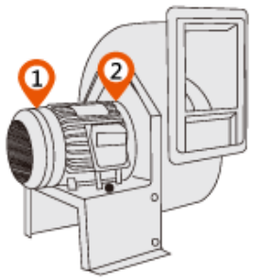
With built-in **ISO 20816** & 10816 standards, you can not only find the vibration value but also learn the holistic health criticalities by **Good, Satisfactory, Unsatisfactory, and Unacceptable four levels.** A sharp color display gives no room for misjudgment. No post-analysis required, prompt on-site result for time-sensitive correction. Integrated Bandpass Filter allows you to have a closer look at the specific frequency range.

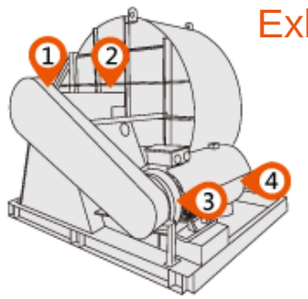
Highlight for novice users

Library of multi machine types & points

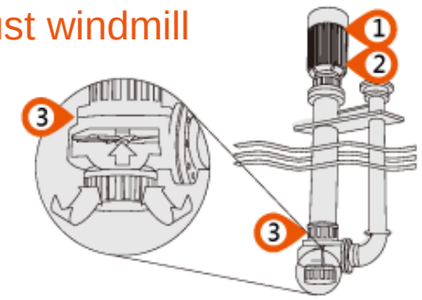
Motor



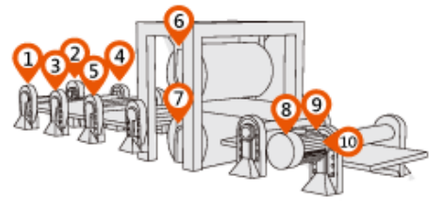




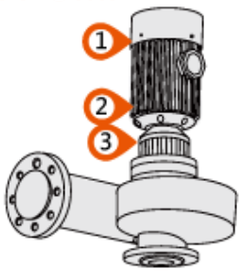
Exhaust windmill

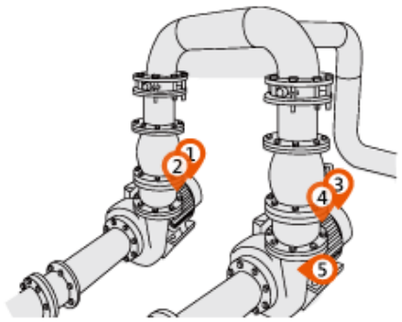


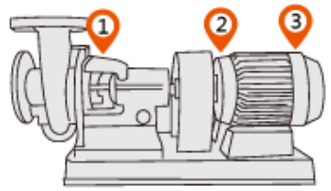
Roll to roll equipment

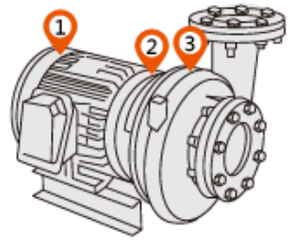


Scroll PUMP

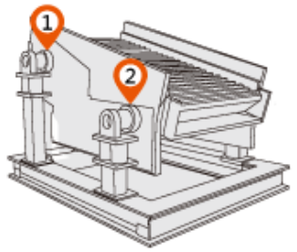




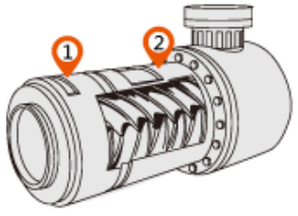


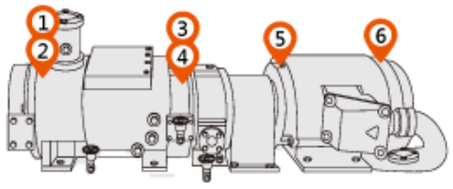


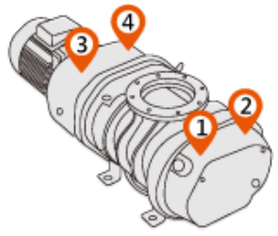
Roll to roll conveyor



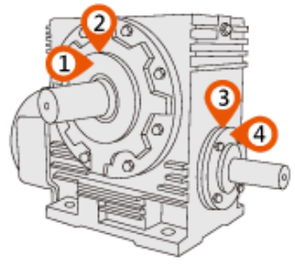
Compressor / Vacuum PUMP



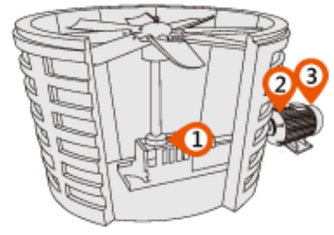




Gear box



Cooling tower



Built-in a dozen of common rotating machines along with orange pins for marking the measurement points. Even no professional background users can start measurement immediately.