

Personal Smart

# SMART ONE<sup>TM</sup> OXI

App-Based Spirometer with  
embedded Oximeter.

The simplest device for Personal Care.  
Real time test available on  
Smartphone and Tablet  
via Bluetooth 5-ready



# MAIN features



## AUTOMATIC PAIR AND PLAY

Automatic pairing via Bluetooth. Real-time test result on your Smartphone and Tablet



## MEASURED PARAMETERS

**Spirometry Parameters:**  
PEF, FEV1

**Oximetry Parameters:**  
%SpO2min, %SpO2mean,  
%SpO2max, BPMmin,  
BPMmean, BPMmax, Ttotal



## COMPLIANCE ATS/ERS 2019

And other Standards including ISO 26782 (for Spirometry), ISO 23747 (for PEF), ISO 80601-2-61 (for Oximetry) and more. CE0476, FDA Pending



## MOBILE APP INCLUDED

Intuitive App for self-management of cardiorespiratory conditions, always included for iOS and Android



# DISTINCTIVE features



## SPIROMETRY GUIDELINES

Suitable for all ages from 5 to 93 years and multi-ethnic groups (GLI predicted sets)



## REAL-TIME OXIMETRY

Innovative reflectance pulse-oximetry sensor (Touch). Easy to use and accurate.



## MEDICAL REPORT

Share with anyone at anytime via eMail, Whatsapp, SMS, Cloud, Drive and other Apps



## COVID-19 PANDEMIC

Avoid going to the hospital or medical offices during COVID-19 pandemic

## GO-TO-MARKET TOOLKIT

Software Development Kit available for System Integrators and App Developers.  
OEM service available for Spirometry and Oximetry.



Learn more about available SDK and OEM



# Always INCLUDED

- 2x AAA 1.5V Batteries
- Single Patient Reusable Turbine
- Plastic reusable mouthpiece
- User manual
- App for Smartphone and Tablet (iOS and Android)

# Compatible SOFTWARE

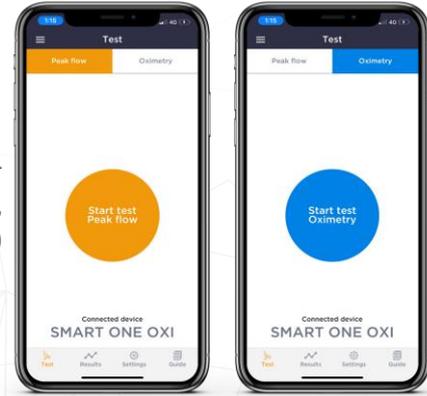
## MIR SMART ONE APP

Mobile App (iOS and Android), for real time **Spirometry and Oximetry** test, directly on your Smartphone and Tablet via Bluetooth



### REAL TIME TEST

Spirometry: PEF, FEV1  
Oximetry: SpO2% (mean), Pulse BPM (mean)



### MEDICAL REPORT

PDF report available for selectable date range. Include test results, traffic light indicators for PEF and e-Diary.

Date	Time	PEF	FEV1	SpO2	Pulse	Notes
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	
5 Sep 2020	11:00 AM	440	1.82	97	70	

### SHARE RESULTS

Share results in PDF With anyone at anytime via eMail, Whatsapp, SMS, Cloud, Drive Bluetooth, Airdrop and other Apps



### PERSONAL TREND

E-diary, symptoms scoring and notes can be added for each test. Graphic trends available for self-monitoring of PEF, FEV1 and SpO2



### INCENTIVE

Real time animation on Smartphone, to improve personal compliance during the test



# Compatible TURBINE

Single Patient Reusable Turbine



Mouthpiece	Turbine Disinfection	Turbine Calibration	Packaging	Antiviral Filter
Included Reusable	Not required	Not required	Individually sealed: 1 unit / box	Not required



PLAY VIDEO



SCIENTIFIC PUBLICATIONS



# Also available in **MORE CONFIGURATIONS**



Technical Specification	Smart One OXI	Smart One	Spirobank Oxi	Spirobank Smart
<b>TYPE OF SPIROMETER</b>	App-Based, for Personal Care, with Oximetry Option	App-Based, for Personal Care	App-Based, for Remote Patient Monitoring, with Oximetry Option	App-Based, for Remote Patient Monitoring
<b>COMPATIBLE TURBINES</b>	Single Patient Reusable Turbine	Single Patient Reusable Turbine	flowMIR™ Disposable Turbine, Single Patient Reusable Turbine	flowMIR™ Disposable Turbine, Single Patient Reusable Turbine
<b>COMPATIBLE SOFTWARES</b>	Smart One App	Smart One App	MIR Spirobank App	MIR Spirobank App, iSpirometry App
<b>EXTERNAL CONTROL</b>	Real time plethysmographic curve and test result on Smartphone/Tablet screen. No internal memory, no display. Data are not stored in the device memory.  Connect to your Smartphone/Tablet via Bluetooth 5-ready	Real time test on Smartphone/Tablet screen. No internal memory, no display. Data are not stored in the device memory.  Connect to your Smartphone/Tablet via Bluetooth 5-ready	Real time plethysmographic curve and test result on Smartphone screen. No internal memory, no display. Data are not stored in the device memory  Connect to your Smartphone via Bluetooth 5-ready	Real time test on Smartphone screen. No internal memory, no display. Data are not stored in the device memory.  Connect to your Smartphone via Bluetooth 5-ready
<b>EHR CONNECTIVITY</b>	Ready-to-Connect with 3rd party Apps for Professional and Personal Care and Clinical Trials	Ready-to-Connect with 3rd party Apps for Professional and Personal Care and Clinical Trials	Ready-to-Connect with 3rd party Apps for Professional and Personal Care and Clinical Trials	Ready-to-Connect with 3rd party Apps for Professional and Personal Care and Clinical Trials
<b>REAL TIME TEST</b>	Simple and intuitive App for Smartphone and Tablet, always included for iOS and Android  E-diary, symptoms and notes can be added for each test.  Test Results can be shared in PDF (via Whatsapp, E-mail, other Apps), and printed directly (via Bluetooth printer).  Real time animation, to help performing a good test.  Easy-to-read graphic trends for self-assessment.  Real time plethysmographic curve.	Simple and intuitive App for Smartphone and Tablet, always included for iOS and Android  E-diary, symptoms and notes can be added for each test.  Test Results can be shared in PDF (via Whatsapp, E-mail, other Apps), and printed directly (via Bluetooth printer).  Real time animation, to help performing a good test.  Easy-to-read graphic trends for self-assessment.	Simple and intuitive App for Smartphone, always included for iOS and Android  E-diary, symptoms and notes can be added for each test.  Test Results can be shared in PDF (via Whatsapp, E-mail, other Apps), and printed directly (via Bluetooth printer).  Real time animation, to help performing a good test.  Easy to read Spirometry Guidelines for test compliance.  Real time plethysmographic curve.	Simple and intuitive App for Smartphone, always included for iOS and Android  E-diary, symptoms and notes can be added for each test.  Test Results can be shared in PDF (via Whatsapp, E-mail, other Apps), and printed directly (via Bluetooth printer).  Real time animation, to help performing a good test.  Easy to read Spirometry Guidelines for test compliance.
<b>MEASURED PARAMETERS</b>	Spirometry Parameters: PEF, FEV1  Oximetry Parameters: %SpO2min, %SpO2mean, %SpO2max, BPMmin, BPMmean, BPMmax, Ttotal  on MIR Smart One App: Spirometry Parameters: PEF, FEV1 Oximetry Parameters: SpO2 (%), Pulse (BPM)	Spirometry Parameters: PEF, FEV1	Spirometry Parameters: PEF, FEV1, FVC, FEV1/FVC, FEF2575, FEV6, VEXT, DTPEF, FEF75, FET, FEF25, FEF50, FIVC, FIV1, PIF, FEV3, FEV05, FEV075, FEV2  Oximetry Parameters: %SpO2min, %SpO2mean, %SpO2max, BPMmin, BPMmean, BPMmax, Ttotal  on MIR Spirobank App: Spirometry Parameters: PEF, FEV1, FVC, FEV1/FVC, FEF2575, FEV6, VEXT, DTPEF, FEF75, FEF25, FEF50 Oximetry Parameters: SpO2 (%), Pulse (BPM)	Spirometry Parameters: PEF, FVC, FEV1, FEV1/FVC, FEF2575, FEV6, VEXT, DTPEF, FEF75, FET, FEF25, FEF50, FIVC, FIV1, PIF, FEV3, FEV05, FEV075, FEV2  on MIR Spirobank App: PEF, FVC, FEV1, FEV1/FVC, FEF2575, FEV6, VEXT, DTPEF, FEF75, FEF25, FEF50  on iSpirometry App: PEF, FVC, FEV1, FEV1/FVC, FEF2575, FEV6

[COMPARE ON WEBSITE](#)



# TECHNICAL datasheet

PRODUCT CODE 911120

## Technical specification

<b>Width</b>	49 mm
<b>Length</b>	109 mm
<b>Thickness</b>	21 mm
<b>Weight</b>	60.7 g (batteries included)

### Turbine



Single Patient Reusable Turbine with Mouthpiece (code 910013)

<b>Mouthpiece</b>	Ø 30 mm (1.18 inches)
<b>Power supply</b>	2 batteries AAA 1.5 V
<b>Consumption</b>	max 12 mA average 8 µA (Stand by)

**Autonomy** 5-10 years (Stand by)

**IP protection level** IP22

**Connectivity** Bluetooth® 5-ready

**Type of electrical protection** Internally powered

**Safety level for shock hazard** Type BF Apparatus

**Conditions of use** Apparatus for continuous use

<b>Storage conditions</b>	Temperature: MIN -25 °C, MAX + 70 °C
	Humidity: MIN 10% RH; MAX 93% RH

<b>Operating Conditions</b>	Temperature: MIN + 5 °C, MAX + 40 °C
	Humidity: MIN 10% RH, MAX 93% RH

<b>Shipping conditions</b>	Temperature: MIN -25 °C, MAX + 70 °C
	Humidity: MIN 10% RH; MAX 93% RH

<b>Applicable standards</b>	ATS/ERS: 2005, 2019 Update ISO 26782: 2009 ISO 23747: 2015 EN ISO 14971: 2019 ISO 10993-1: 2018 2011/65/UE Directive EN ISO 15223:2016 IEC 60601-1:2005 + A1: 2012 EN 60601-1-2: 2015 IEC 60601-1-6:2010+Amd2013 IEC 60601-1-11: 2015 ISO 80601-2-61: 2017
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## Spirometry

<b>Flow sensor</b>	bi-directional digital turbine
<b>Flow range</b>	16L/s (960 L/m)
<b>Volume range</b>	10 L
<b>Volume accuracy</b>	±2.5% or 0,05 L
<b>Peak Flow accuracy</b>	±10% or 0,33 L/s
<b>Dynamic resistance</b>	<0.5 cm H <sub>2</sub> O/L/s (@ 12 L/s)
<b>Temperature sensor</b>	none
<b>Available test</b>	Peak Flow
<b>Measured parameters</b>	FEV1, PEF

**Memory capacity** the application on the remote device (smartphone/tablet) memorizes data

## Oximetry

<b>Measuring method</b>	double wavelength
<b>%SpO<sub>2</sub> range</b>	70%-100%
<b>%SpO<sub>2</sub> accuracy</b>	±1.9%
<b>Average number of beats for the calculation % SpO<sub>2</sub></b>	12 beats
<b>Pulse Rate range</b>	30-200 BPM
<b>Pulse Rate accuracy</b>	±3%
<b>Average interval for BPM calculation</b>	12 seconds
<b>Quality signal indicator</b>	0-8 lines
<b>Available tests</b>	spot
<b>Measured parameters</b>	%SpO <sub>2</sub> MIN, %SpO <sub>2</sub> MEAN, %SpO <sub>2</sub> MAX, BPM <sub>MIN</sub> , BPM <sub>MEAN</sub> , BPM <sub>MAX</sub> , T <sub>TOTAL</sub>

**Wavelength sensors** Red 660 nm  
Infrared 880nm

**Maximum optical output power** 1.2 mW

## Certification & registration

<b>CE 0476</b>	MED 9826
<b>FDA 510 (k)</b>	pending
<b>Health Canada</b>	pending
<b>CND Code</b>	Z12150102
<b>GMDN Code</b>	46906

### ITALY

MIR Head Office  
Via del Maggolino, 125  
00155 Roma  
Tel. +39 06 22 754 777  
Fax +39 06 22 754 785  
Mir.spirometry.com

### USA

MIR USA, Inc.  
5462 S. Westridge Drive  
New Berlin, WI 53151  
Phone +1 (262) 565-6797  
Fax +1 (262) 364-2030

### FRANCE

MIR Local Office  
Jardin des Entreprises,  
290, Chemin de Saint Dionisy  
30980 LANGLADE (France)  
Phone +33 (0)4 66 37 20 68  
Fax +33 (0)4 84 25 14 32