Intelligent Integration Interface
User Manual

Clinical System Integration for Numed Healthcare Products

Revision: 4.6

Software version: 2.1.0_248

numed healthcare

Supply ► Installation ► Training ► Support

Alliance House, Roman Ridge Road, Sheffield S9 1GB • Tel: 0114 2433896 • Email: sales@numed.co.uk

www.numed.co.uk

LICENCE AGREEMENT

Details of the software licence agreement is available on our website:

https://www.numed.co.uk/i3-terms-conditions

BY INSTALLING, USING OR ALLOWING THIS SOFTWARE TO BE INSTALLED OR USED, YOU ARE BOTH ACKNOWLEDGING THAT YOU FULLY UNDERSTAND THESE TERMS AND CONDITIONS AND AFFIRM THAT YOU AGREE TO COMPLY, IN FULL, WITH THESE TERMS AND CONDITIONS.

The Intelligent Integration Interface (I^3) software accesses patient data from the Clinical Server through the clinical system provider's approved Application Programming Interface. It is the user's responsibility to ensure the patient data as displayed by the I^3 software is the correct information for the patient undergoing consultation.

Warranty

Numed warrants the software media (i.e. CD-ROM/Installation file) and documentation materials to be free from defects in workmanship and materials for a period of 60 days from date of purchase. Numed will replace any defective media or documentation materials returned to Numed during this period. This is the sole remedy for any such defects. Numed shall have no liability for any other damage.
NUMED DISCLAIMS ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY OF NON-INFRINGEMENT OF THIRD PARTY RIGHTS AND THE IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL NUMED BE LIABLE FOR ANY INDIRECT, CONSEQUENTIAL, OR SPECIAL DAMAGES, INCLUDING LOSS OF TIME OR PROFITS, INCURRED BY ANY END-USER OR THIRD PARTY RESELLER OR ANY OTHER THIRD PARTY, WHETHER IN AN ACTION IN CONTRACT OR TORT OR BASED ON A WARRANTY, EVEN IF NUMED HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.
NUMED DOES NOT MAKE ANY EXPRESS OR IMPLIED WARRANTIES, REPRESENTATIONS, OR ENDORSEMENTS WHATSOEVER (INCLUDING AND WITHOUT LIMITATION TO WARRANTIES OF TITLE OR NONINFRINGEMENT, OR THE IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE).
WITH REGARD TO THE SOFTWARE, NUMED AND ITS SUPPLIERS AND DISTRIBUTORS SHALL NOT BE LIABLE FOR ANY COST OR DAMAGE ARISING EITHER DIRECTLY OR INDIRECTLY FROM THE DOWNLOADING, INSTALLATION OR USE OF THE SOFTWARE. NUMED DOES NOT WARRANT THAT THE SOFTWARE WILL BE ERROR FREE OR THAT DEFECTS IN THE SOFTWARE WILL BE CORRECTED. THE SOFTWARE IS PROVIDED ON AN "AS IS" BASIS. IN NO EVENT WILL NUMED OR ITS SUPPLIERS OR DISTRIBUTORS BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL, OR INDIRECT DAMAGES (INCLUDING, BUT NOT LIMITED TO, DAMAGES FOR LOSS OF PROFITS, BUSINESS INTERRUPTIONS, LOSS OF PROGRAMS OR INFORMATION, AND THE LIKE) ARISING OUT OF THE DOWNLOADING, INSTALLATION OR USE OF, OR INABILITY TO USE, THE SOFTWARE, EVEN IF NUMED OR ITS AUTHORISED REPRESENTATIVES HAVE BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

numed healthcare
Supply ► Installation ► Training ► Support
Alliance House, Roman Ridge Road, Sheffield S9 1GB • Tel: 0114 2433896 • Email: sales@numed.co.uk
www.numed.co.uk

Intelligent Integration Interface

User Manual

Contents

Introduction

The Intelligent Integration Interface (I^3) is a software application that acts as a link between the clinical system and a range of diagnostic products supplied by Numed Healthcare.
I^3 is a Java based application designed to update automatically over the Internet, so updates and bug fixes can be automatically deployed quickly and efficiently with little or no user interaction. The software checks for an available update the first time it is used each day. A 'Check for Software Updates' button is available in the Settings screen which forces a check for a new version from the update server.

Pre-requisites

The following are required before installation and use of the I^3 software.

- Windows 10 or 11 Operating System.
- For use with the GE Healthcare ECG machines, Cardiosoft v6.71 or later must be installed and correctly configured.
- For use with the QRS Diagnostic ECG machines, Cardioview v7 (Windows 10 64-bit) must be installed and correctly configured.
- For use with the Schiller MS12-USB ECG system, CS-104 version 19.02.1 or later must be installed and correctly configured.
- For use with the IEM Mobil-o-Graph BP Monitors, HMS-CS v4.71 or later must be installed and correctly configured.
- For use with the MedChip SpiroConnect Spirometer, SpiroConnect Data Manager software version 1.0 or later must be installed and correctly configured.
- For use with the NDD Trueflow USB spirometer, EasyOne Connect software version 03.03.00.11 or later must be installed and correctly configured.
- For Seca height/weight integration, a Seca 456 wireless USB receiver is required, correctly configured to link to a compatible Seca measuring device.

Clinical System Compatibility

I^3 is currently compatible and accredited for use with the following clinical systems:

- EMIS PCS (no further updates available)
- EMIS WEB
- TPP SystmOne
- InPS Vision (LAN and Enterprise)
- Clanwilliam Socrates, Helix and HEALTHone (excluding MAC ECG machines)

The software may be expanded into other clinical systems in due course.

Product Compatibility

I³ is currently compatible with the following diagnostic products:

- GE Healthcare Cardiosoft (v6.71 or later) CAM-USB ECG System
- GE Healthcare MAC600, MAC800, MAC1200, MAC1600 ECG machines when used with Cardiosoft software or SD card readers (when ECG machine supports PDF export to SD card)
- QRS Diagnostic-Vectracor Universal ECG cable with Cardioview 7 (Windows 10 64-bit) software. Cardioview 7 is only compatible with the USB version of Universal ECG.
- QRS Diagnostic-Vectracor Universal SmartECG cable with Cardioview 7 software (Windows 10 64-bit only).
- Schiller MS12-USB ECG cable with CS-104 software
- IEM Mobil-o-Graph Ambulatory Blood Pressure Monitor with HMS-CS software
- MedChip SpiroConnect Spirometer with SpiroConnect Data Manager software
- NDD Trueflow with EasyOne Connect software (formerly Easy On-PC) – Vision clinical system only
- Seca 360 Wireless Measurement Systems

The software may be expanded into other diagnostic products or services in due course.

Installation

Initial installation is usually performed by remote support from our Technical Support team. You must be logged on as a user with local administrator rights for the software to install successfully.

If self-installation is required, please contact our technical support team for details of how to obtain the software.

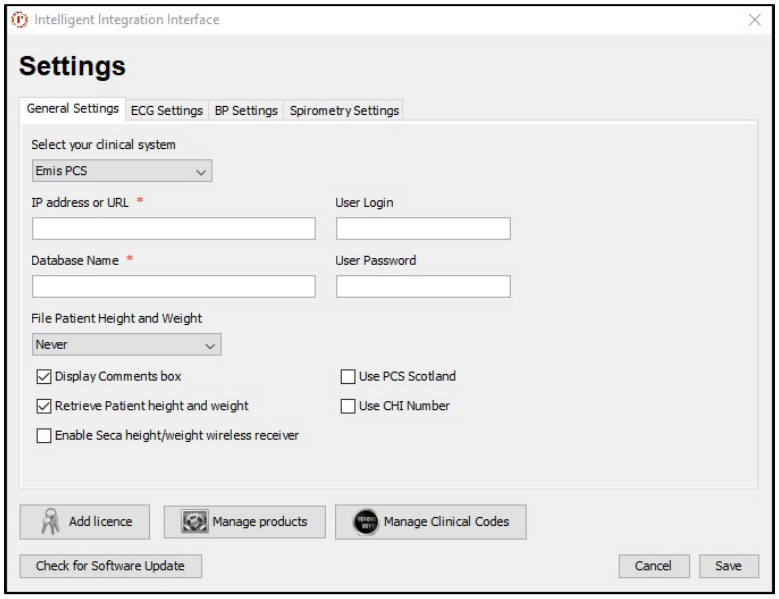
Initialisation with the Clinical System

EMIS PCS Configuration

Start the I³ software from the desktop shortcut.

Click on the Settings icon in the top right corner of the first screen. The Settings screen will appear.

When the software is first installed, the clinical system can be selected from the dropdown box. Select **EMIS PCS**. Once the clinical system has been selected, subsequent changes to the system type are protected by a password. The password changes on a daily basis. This is to ensure if the clinical system is altered, our technical support team can register the change of clinical system so the correct licence renewal can be applied. Please contact Numed Healthcare Technical Support on 0114 399 0010 for assistance with changing the clinical system.



Enter the EMIS PCS server IP address or URL along with the database name. If you do not know these, please contact your local IT helpdesk or EMIS support.

For installations in Scotland, tick the **Use PCS Scotland** box. To use the Community Health Index number in lieu of the NHS number, click the **Use CHI Number** box.

The **User Login** and **User Password** will not normally be required as the software usually auto-detects the current EMIS user. You will be prompted to enter these when using the software should the need arise.

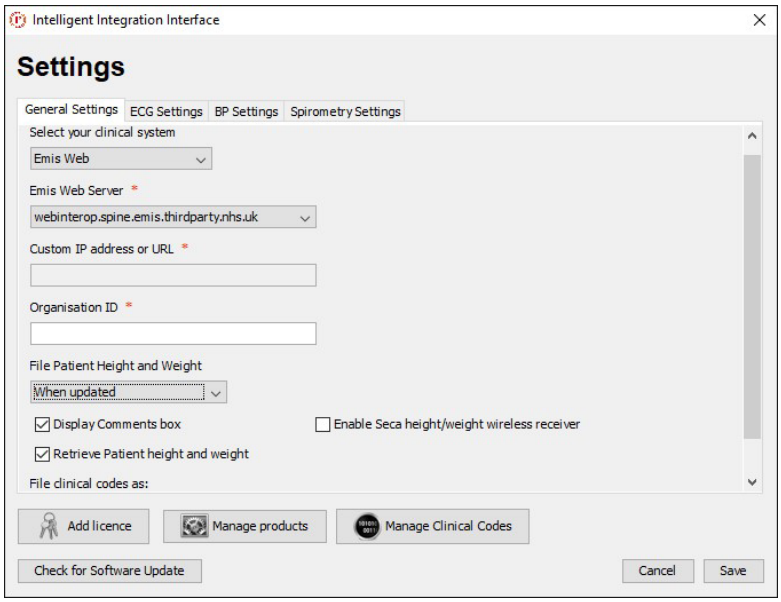
See the **Configuration Settings Common to all Clinical Systems** section for details of other settings.

EMIS WEB Configuration

Start the I³ software from the desktop shortcut.

Click on the Settings icon in the top right corner of the first screen.  The Settings screen will appear.

When the software is first installed, the clinical system can be selected from the dropdown box. Select **EMIS WEB**. Once the clinical system has been selected, subsequent changes to the system type are protected by a password. The password changes on a daily basis. This is to ensure if the clinical system is altered, our technical support team can register the change of clinical system so the correct licence renewal can be applied. Please contact Numed Healthcare Technical Support on 0114 399 0010 for assistance with changing the clinical system.



Select the **EMIS WEB server** address from the dropdown selection, or select Custom Server and enter the Server IP or URL. The **Organisation ID** must also be entered – this is usually the practice CDB number. If you do not know these, please contact your local IT helpdesk or EMIS support.

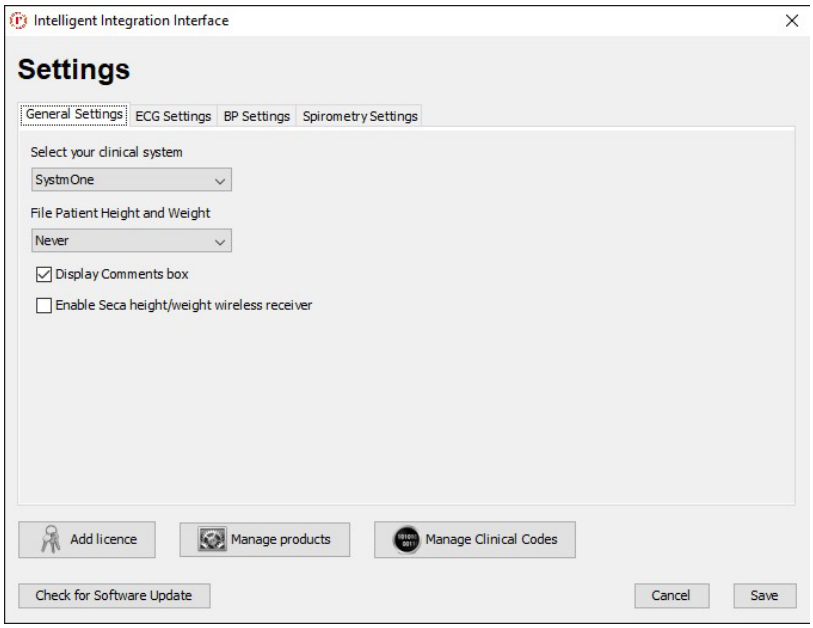
See the **Configuration Settings Common to all Clinical Systems** section for details of other settings.

TPP SystmOne Configuration

Start the I³ software from the desktop shortcut.

Click on the Settings icon in the top right corner of the first screen.  The Settings screen will appear.

When the software is first installed, the clinical system can be selected from the dropdown box. Select **SystmOne**. Once the clinical system has been selected, subsequent changes to the system type are protected by a password. The password changes on a daily basis. This is to ensure if the clinical system is altered, our technical support team can register the change of clinical system so the correct licence renewal can be applied. Please contact Numed Healthcare Technical Support on 0114 399 0010 for assistance with changing the clinical system.



See the **Configuration Settings Common to all Clinical Systems** section for details of other settings.

InPS Vision Configuration

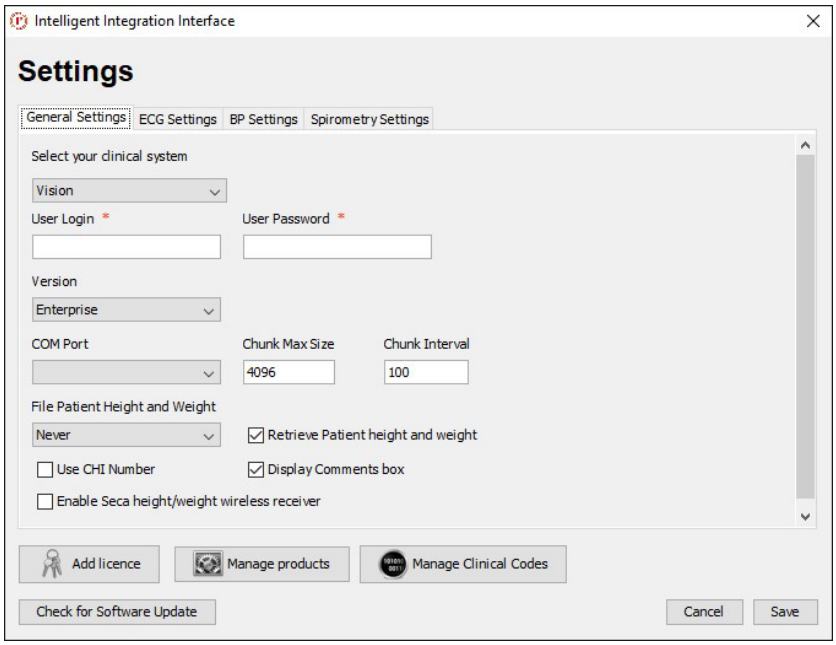
Start the I³ software from the desktop shortcut.

Click on the Settings icon in the top right corner of the first screen. The Settings screen will appear.

When the software is first installed, the clinical system can be selected from the dropdown box. Select **Vision**. Once the clinical system has been selected, subsequent changes to the system type are protected by a password. The password changes on a daily basis. This is to ensure if the clinical system is altered, our technical support team can register the change of clinical system so the correct licence renewal can be applied. Please contact Numed Healthcare Technical Support on 0114 399 0010 for assistance with changing the clinical system.

A valid Vision username and password must be entered to allow I³ to gain access to the clinical system data.

The Vision version should then be selected – either LAN or Enterprise.



LAN should be selected for practices with their own server where the workstations are running the Vision client.

Enterprise should be selected for hosted systems including AEROS and VTS (Vision Terminal Services) systems where the Vision client runs on a remote desktop.

Systems running in Enterprise mode will require an additional software component to be installed on the server. This additional component, known as **Numed Enterprise Link**, is required to act as an interface between the Vision system running on the remote desktop and the medical equipment applications running on the local desktop. Installation of the Numed Enterprise Link on the server is completed by InPS for AEROS systems and either InPS or a local IT service provider for VTS systems. This will be discussed and arranged at the time of purchase of the I³ software. Customers migrating from LAN to Enterprise will need to contact Numed Technical Support ahead of the migration to facilitate enabling of the server side software.

Enterprise systems will also require separate installation of the com0com virtual com ports which are used to send and receive data securely to and from the remote desktop session. The installer for com0com is included on the I³ installation CD. Numed Technical Support can assist with the set up and configuration of these ports if required.

When **Enterprise** is selected, some additional settings become enabled:
COM Port: this is the com0com port used by the I³ software. The default is COM8. The Numed Enterprise Link software on the server must be set to use to paired com0com port. Numed Technical Support will assist with this if required.
Chunk Max Size and Chunk Interval: these settings control the data flow between I³ and the remote desktop software. These setting should only be changed in consultation with Numed Technical Support.

To use the Community Health Index (CHI) number in lieu of the NHS number, click the **Use CHI Number** box.

See the **Configuration Settings Common to all Clinical Systems** section for details of other settings.

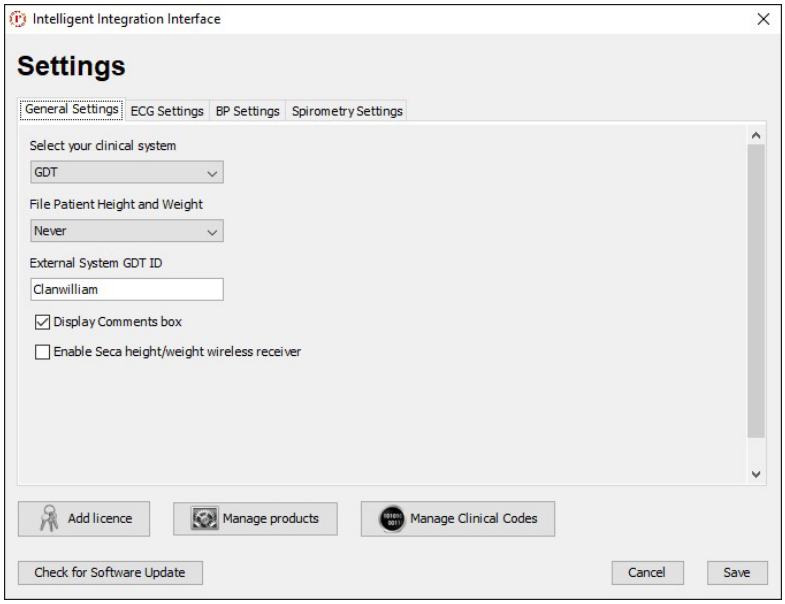
GDT Interface Configuration

The GDT Interface is intended to work with clinical systems that do not have a formal Application Programming Interface but do allow the exporting and importing of data through the GDT protocol. When in GDT mode, the software must be initiated by the clinical system in normal use.

Details of compatible clinical systems can be obtained by contacting Numed Technical Support.

Click on the Settings icon in the top right corner of the first screen.  The Settings screen will appear.

When the software is first installed, the clinical system can be selected from the dropdown box. Select **GDT**. Once the clinical system has been selected, subsequent changes to the system type are protected by a password. The password changes on a daily basis. This is to ensure if the clinical system is altered, our technical support team can register the change of clinical system so the correct licence renewal can be applied. Please contact Numed Healthcare Technical Support on 0114 399 0010 for assistance with changing the clinical system.



External System GDT ID: This is the identifier the clinical system presents to I³ and expects to receive back in the GDT files produced. For the Socrates, Helix and HealthOne, this entry should be 'Clanwilliam'. If using other clinical systems, the system provider will be able to advise on this entry. Please contact Numed Technical Support if assistance is required.

See the **Configuration Settings Common to all Clinical Systems** section for details of other settings.

Configuration Settings Common to all Clinical Systems

General Settings Tab

File Patient Height and Weight: This affects the default behaviour of the filing of the height and weight data. Three options are available:

Never: The patient Height and Weight data will never be automatically selected by default for filing back to the clinical record.

Always: The patient Height and Weight data will always be automatically selected by default for filing back to the clinical record.

When updated: The patient Height and Weight data only be automatically selected for filing back to the clinical record if the values are updated on the patient details confirmation screen.

Retrieve Patient height and weight tick box (EMIS and Vision only): When enabled, I³ will attempt to retrieve previously recorded height and weight data from the patient record in the clinical system. However, on slow networks or if a patient has a large medical record, this type of data retrieval can be slow. De-selecting the tick box will speed up the retrieval of the patient data but will require the height and weight data to be entered manually in to the I³ patient data form. Patient Height and Weight is always retrieved when using other clinical systems, assuming the data values have previously been recorded in the patient record.

The **Display Comments box** allows a comment to be optionally filed alongside the consultation.

File Clinical Codes dropdown selection box allows the selection of Read/CTV3 codes or Snomed-CT codes to be displayed and filed to the clinical system. EMIS Web uses either Read or Snomed. TPP SystmOne uses CTV3, but SystmOne will map the CTV3 codes to Snomed upon filing. Vision uses READ codes but maps the codes to Snomed upon filing.

Enable Seca Height/Weight Wireless Receiver: When ticked, communications with the Seca USB Wireless Receiver will be activated, enabling direct transmission of height and/or weight measurements from compatible Seca measuring devices to the I³ software. If the wireless receiver is not found when the box is ticked, a warning message will be shown.

ECG Settings Tab

CardioSoft Settings:

CardioSoft executable path: If using the GE CAM-USB ECG cable with CardioSoft software, this is the directory in which the CardioSoft software is installed.

Import CardioSoft Option Codes File: This permits the text file containing the option codes for a particular CAM-USB device to be imported into I³. Once imported, the device serial number will be available for selection when the 'Choose Product Serial Number' option described below is enabled. The imported text file name should be the serial number of the associated CAM-USB device, as this is what will appear in the dropdown selection box during use.

Choose Product Serial Number when using CardioSoft: When enabled and CardioSoft CAM-USB is in use, a pop-up window will appear during the ECG acquisition process allowing selection of the product serial number from a list of those I³ is aware of. Selecting a serial number will automatically import the correct option codes to CardioSoft for the associated device. This permits easy device selection when multiple devices are in use in the same practice, or when loan equipment is issued during routine servicing or repair.

GE Connectivity Server Mode: Tick this box when using a MAC ECG machine that uses the GE Connectivity Server to transfer data to the PC (currently only MAC600 and MAC2000). When ticked, I³ will restart the Connectivity Server software each time it starts, which enhances data transfer reliability between the MAC and the PC.

MAC PDF Filer: PDFs Directory: If using a GE MAC ECG Machine, this should be set to the folder in which the PDF reports will be stored. This can either be a folder on the local drive, or a removable drive such as a card

reader. If the removable drive location is used, the removable drive must be connected before starting the I³ software.

Cardiosoft Settings file path: This is where I³ will look for the Cardiosoft configuration settings. This setting cannot be changed from the default without the assistance of Numed Technical Support.

PDF Source: Select whether the PDF reports are being filed from an SD Card or transferred from the MAC ECG machine through Cardiosoft. This setting ensures I³ knows what filename format to expect.

Patient ID: (EMIS only) Select whether the PDF filename contains the EMIS ID number or the NHS/CHI number as the patient identifier.

Universal ECG / Biolog Settings

Software Package: Select the ECG software package installed. Cardioview 5 is not compatible with Windows 10, Cardioview 6 or later must be used. Biolog is not compatible with Office Medic.

CardioView / Office Medic executable path: The installation path of the Office Medic or Cardioview software. If using CardioView software, this is the path to the CardioView software 'bin' folder.

Schiller CS-104 Settings

Schiller CS-104 executable Path: This is the directory in which the CS-104 software is installed. The name of the executable file must also be included.

Username: The I³ software requires a username and password to access the CS-104 software. This must be configured within the CS-104 software and the username entered here. This setting can be left blank, in which case the clinician will be required to log in to the ECG software when the acquisition begins.

Password: Enter the password for the associated username above. This setting can be left blank, in which case the clinician will be required to log in to the ECG software when the acquisition begins.

EMR Device Name: Four-digit alphanumeric code which must match the setting in the CS-104 software and is used for the data transfer between the applications.

Device ID: Four-digit alphanumeric code which must match the setting in the CS-104 software and is used for the data transfer between the applications.

BP Settings Tab

IEM Mobil-o-Graph executable path: If using the IEM Mobil-o-Graph Ambulatory BP Monitor with HMS-CS software, this is the directory in which the HMS-CS software is installed.

Update PDF Export Settings: This button copies the most recent PDF report configuration from the HMS-CS software and uses it for the exported report filed to the clinical system. The required report settings should be made from within the HMS-CS software before clicking this button to replicate the report to the I^3 software. The button will be greyed out if no report settings have yet been saved in the HMS software.

Spirometry Settings Tab

SpiroConnect executable path: If using the MedChip SpiroConnect Spirometer and Data Manager software, this is the directory in which the SpiroConnect Data Manager software is installed.

Click **Save** to store the settings. If this is the first time the software has been used, it will now be necessary to enter the product licence keys. Please see the **Adding Product Licences** section.

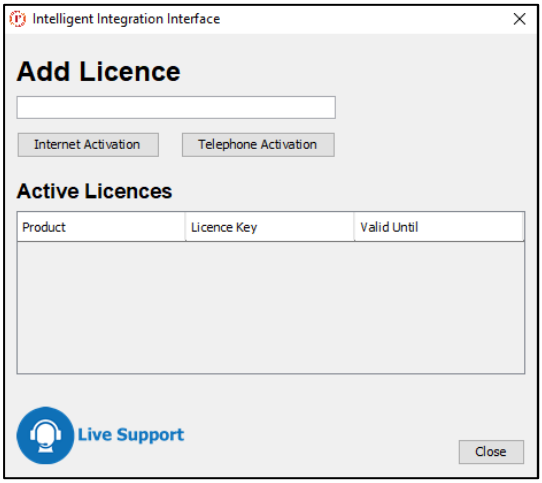
Adding Product Licences

Before the software can be used, one or more product licences must be added to enable the link to the relevant products.

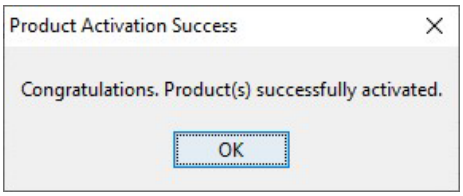
An individual licence code will enable one or more products depending on the code used.

Add a licence code by following the steps below:

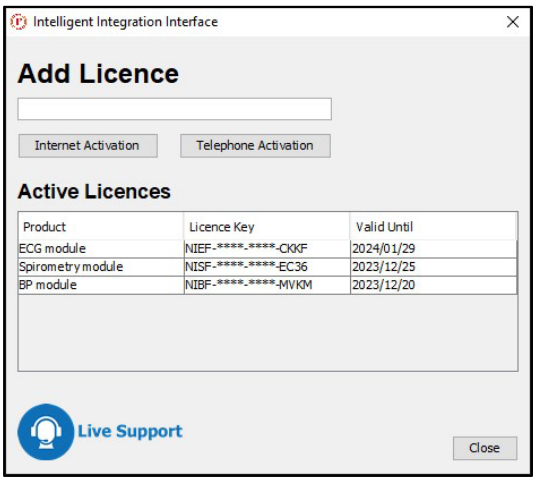
1. Start the I³ software from the desktop shortcut
2. Click on the **Settings** button
3. Click the Add Licence button. The following screen will be shown:



Type in the licence code provided with the software and click **Internet Activation**. If the licence code registers successfully a message will be shown:



The enabled products, licence keys, and expiry dates will then be shown:



If Internet activation fails, double check the correct licence code has been entered. If the problems persist, please call Numed Healthcare Technical Support on **0114 399 0010** for assistance or click the Live Support button. Support is available between 8am and 5:30pm, Monday to Friday.

Note: Live Support is not available when using the GDT interface (Eg. Socrates, Helix, HEALTHone)

If telephone activation is required, the support technician will guide you through the process.

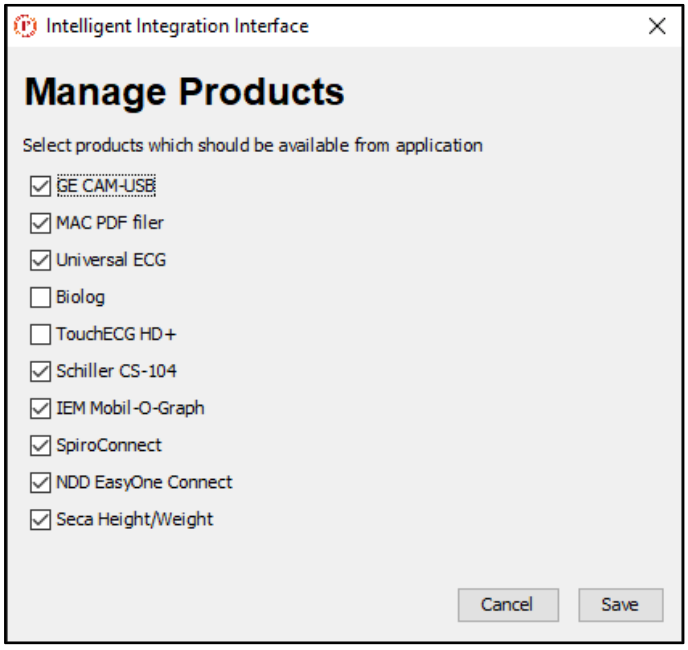
IMPORTANT:

- The licence codes supplied are **practice specific** and must not be used or shared at other sites (except branch sites that use the same clinical system database).
- If the licence code is used on an unauthorised site or is installed on a high volume of PCs, this may result in the licence code becoming locked, which will ultimately result in the software locking out the licensed product. Where there are legitimate requirements for installation on a high number of PCs in the same practice, please contact Numed Technical Support for assistance.
- When the licence renewal date approaches, the software will display warnings of the imminent expiry. The software will continue to function normally until a few days after the expiry date. Renewal notices are emailed to the organisation's nominated contract administrator. When the licence is renewed, the software will automatically pick up the updated renewal date from the Internet server. If the software licence is not renewed, the software will cease to function a few days after the expiry date.
- If no licence codes are entered, or all licence codes have expired, the Add Licence screen will open as the software is started.
- There is no individual licence code for the Seca Height and Weight integration. This is an add-on to existing diagnostic products. Therefore, one or more diagnostic products must be licensed for the Seca Height and Weight integration to be enabled.

Managing Products

As product licences are added, the associated product links become enabled. However, for ease of use, it is possible to disable a licensed product from the user interface so only the products that are in regular daily use are available to be selected.

1. Start the I³ software from the desktop shortcut
2. Click on the **Settings** button
3. Click the **Manage Products** button
4. Tick the products to enable them on the user interface or remove the tick to make the product unavailable. Up to 4 ECG products can be enabled at any one time. If a product is greyed out, no licence is currently active for that product. See Adding Product Licences section.



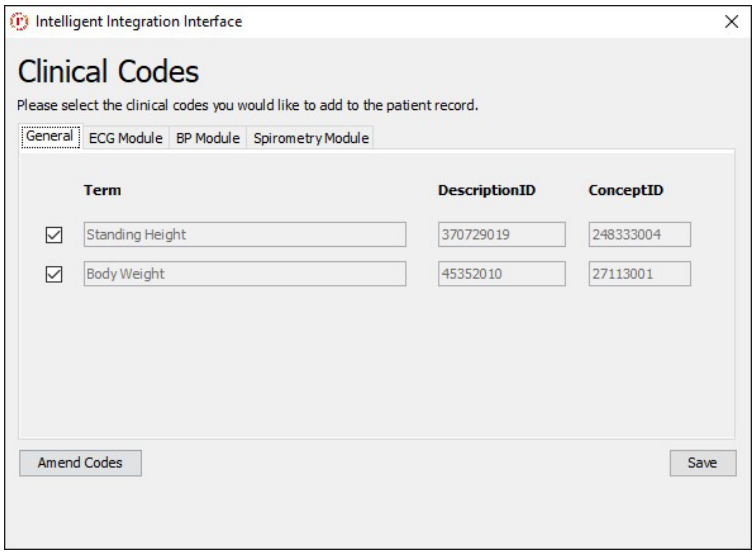
Managing Clinical Codes

Clinical Terms and Codes can be filed alongside the results of the test. Clinical code filing is enabled by default, but can be disabled if required. It is possible to choose which Clinical codes are available for filing from a selection of the data available from the diagnostic product.

The actual Clinical code(s) filed can be amended on written request. Please contact Numed Healthcare Technical Support for assistance on 0114 399 0010.

Follow the steps below to select which Clinical codes are filed.

1. Start the I³ software from the desktop shortcut.
2. Click on the **Settings** button.
3. Click the **Manage Clinical Codes** button.
4. Click the tab of the product whose Clinical codes need amending.
5. Use the tick boxes to select or deselect whether a Clinical code is available for filing. The SpiroConnect Spirometry software has many Clinical codes available. It is not anticipated that all users will require the filing of all codes – users should select those they require from the list of available codes. When using the GDT Interface as the clinical system, the data values are exported when the values are ticked, but the Clinical codes are not applicable.
6. The actual Clinical code filed for a specific data value can be amended (EMIS, Vision and SystmOne only). However, amending of Clinical codes is password protected and must be requested in writing. Numed Healthcare Technical Support will assist with this.

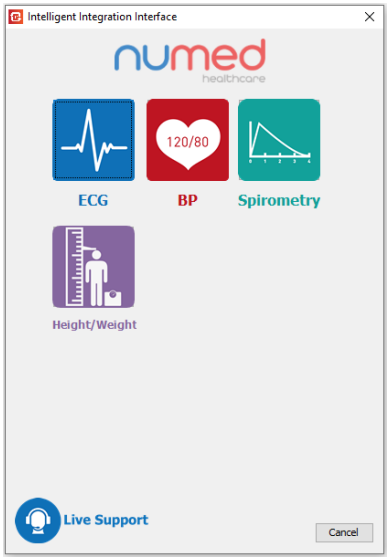


Using I³ with GE Healthcare CAM-USB and CardioSoft

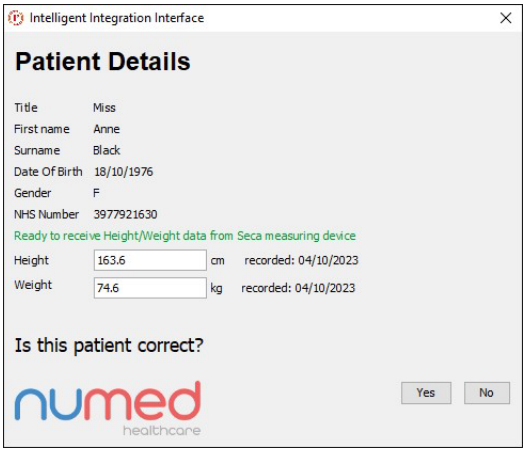
To acquire an ECG from the GE Healthcare CAM-USB cable and store as a PDF in the patient's notes, follow the steps below:

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

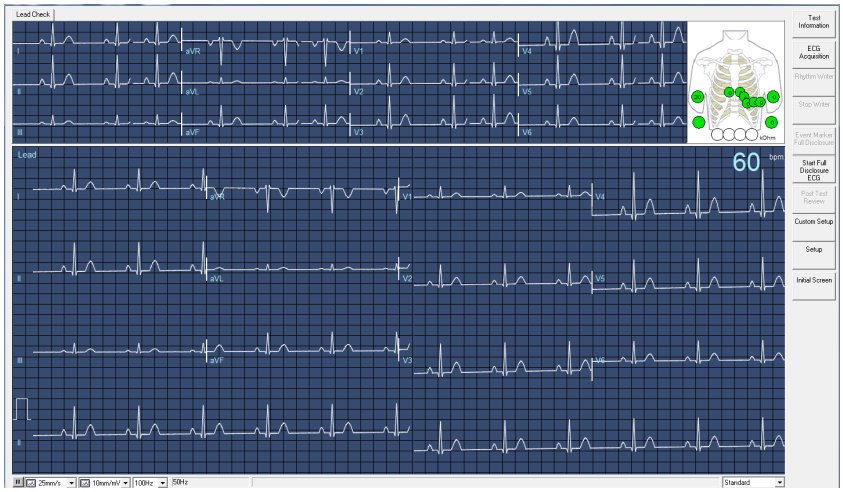
4. Click the **Start** button. The Select Product screen will appear.



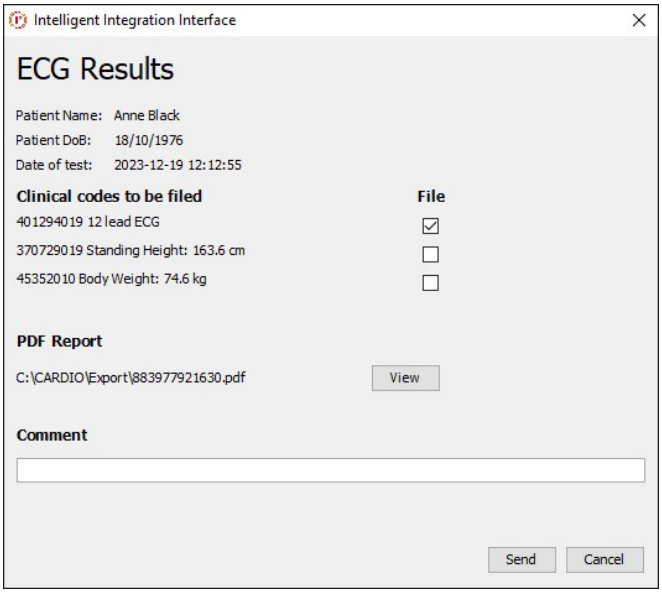
5. Click the **ECG** button. If multiple ECG products are enabled, a sub-menu will be shown – select the **GE CAM-USB** from the list of products and click the **Start** button.
6. If product serial number selection is enabled in the Settings, a drop-down box will appear allowing the serial number of the device in use to be chosen. Select the correct serial number and click OK.
7. After a second or two, the current patient's details should be shown in a window like the one below:



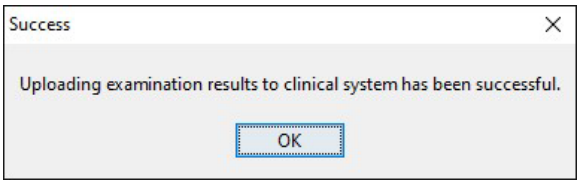
8. If Seca Height/Weight transmission is enabled, the software will then display it is ready to receive the height/weight data. Press the 'Send' button on the Seca measuring device. Any new values received will be displayed and the time the data was received will be shown. Verify the data is correct. Data can be re-sent from the Seca device if required.
9. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
10. CardioSoft will initialise and the ECG monitoring screen should appear as shown below.



11. The connection indicator in the top right corner should show all ten leads as green, indicating good patient contact. If any of the lead positions show yellow or red, the lead contact requires attention.
12. When the quality of the ECG is satisfactory, click the **ECG Acquisition** button. There may be a delay of up to 10 seconds whilst the ECG is acquired. 'ECG Analysis' will appear briefly in the top section of the screen as the acquisition completes.
13. As the Acquisition completes, the **Post Test Review** button will become available – click this to review the Test Summary (Measurements, Automatic Interpretation etc.).
14. After reviewing the data, close the Post Review Window by clicking the cross in the top right corner of the window to exit CardioSoft.
15. The integration software will display the patient details and a Clinical code under which these results will be filed. The PDF report of the ECG recording can be previewed by clicking the **View** button. A comment can also optionally be added, which will be filed alongside the PDF attachment.



16. Click the **Send** button to send the results to the clinical system. Clicking **Cancel** will discard the results.
17. After a few seconds, a message showing successful filing should be displayed. If filing or upload is not successful, an error message will be shown.



It is recommended the result is then viewed in the clinical system to verify correct filing before the patient leaves.

Using I³ with MAC PDF Filer

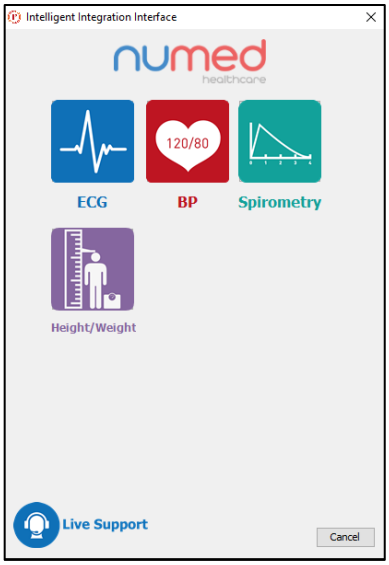
The MAC PDF Filer is designed to quickly and easily attach the PDF reports from the GE range of MAC ECG machines in to the clinical system. The process of actually transferring the PDFs from the MAC ECG machine to the PC varies between machines – please refer to the product manual for the machine in use.

Note for GDT Interface Users: MAC PDF filer is not available when using the GDT interface as the clinical system. This includes Socrates, Helix and HEALTHone.

Once the PDFs have been transferred to the PC, follow the steps below to file the reports into the patient record.

1. Start the I³ software from the desktop shortcut.
2. As the software starts, the following screen will be shown:

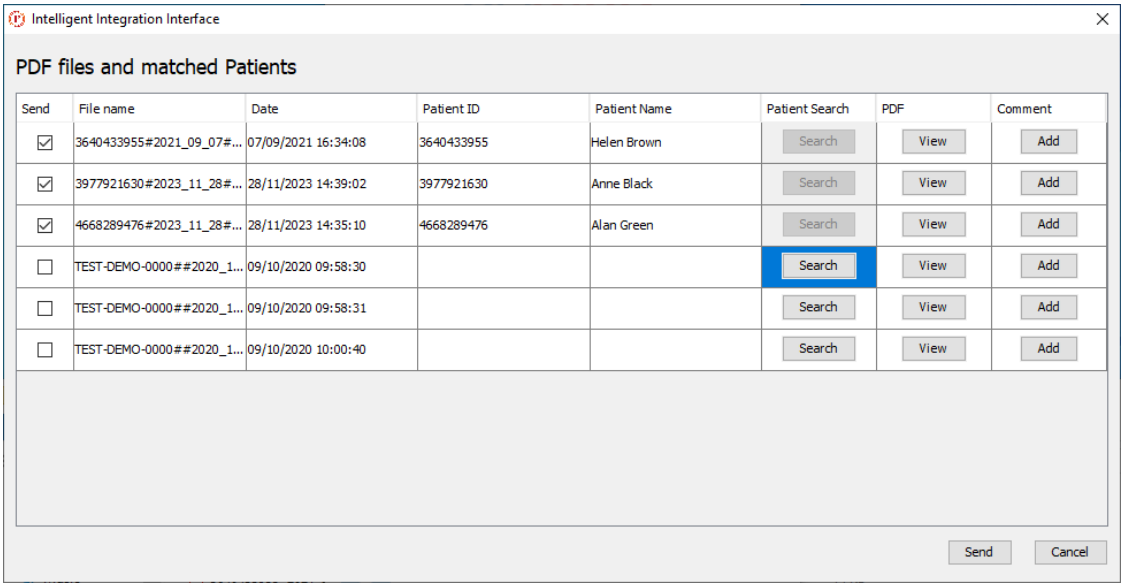
3. Click the **Start** button. The Select Product screen will appear.



4. Select the **ECG** icon. If multiple ECG products are enabled, a sub-menu will be shown – select **MAC PDF filer** from the list of products and click the **Start** button.
5. A list of PDF files found in the PDF directory (specified in Settings) will be shown. I³ will attempt to look up the correct patient ID based on the filename of each of the PDFs.

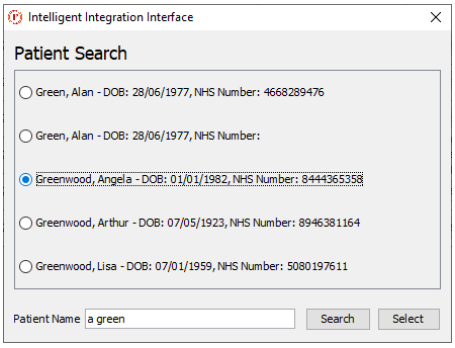
   Successfully matched patients will be shown in the list and selected ready for sending to the clinical system.

Filenames that are not automatically matched to a patient can be manually associated with the correct patient as follows:



a. The 'Date' field will show the date and time the PDF report was created. This will **not** necessarily be the exact time the ECG was performed. If necessary, click the **View** button to see the details of the PDF report.

b. Click the Search button and enter the search details. In EMIS and Vision, enter the name of the patient. TPP SystmOne allows searching on name and date of birth. The example below shows the EMIS and Vision search, TPP SystmOne is similar. The surname only or the first name **and** surname can be entered separated with a space. Either the full name(s) or the first few letters of the name(s) can be entered.

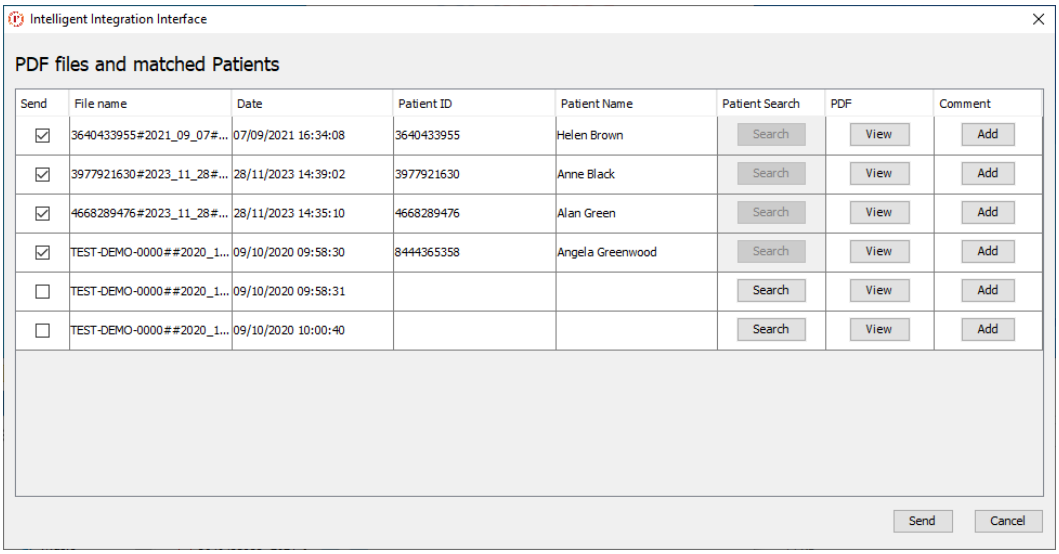


In this example 'a green' has been entered in the Patient Name box, so the results have found anyone whose first name starts with an 'a' and whose surname also starts with 'green'.

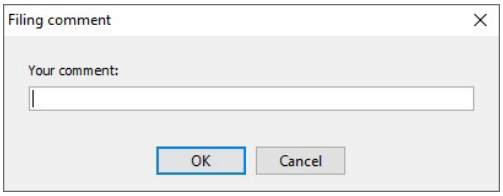
The search is not case sensitive.

c. Click on the patient required from the search results and click the **Select** button.

d. The selected patient will then be associated with the PDF file ready for sending to the clinical system. To remove the association, click the **Cancel** button at the bottom of the screen.



6. If the 'Display Comments box' option is selected in the Settings menu, click the **Add** button next to a PDF to allow an optional comment to be filed alongside the consultation. Enter the comment in the box and click OK, or click Cancel to file without a comment. (Note the Add button will be greyed out if the 'Display Comments box' is not selected in the Settings screen)



7. When all the required PDFs are associated with the correct patients, click the **Send** button.

   The files with the Send tick box checked will be sent to the associated patient records. To prevent filing, remove the tick from the Send box next to the file.

Important Notes:

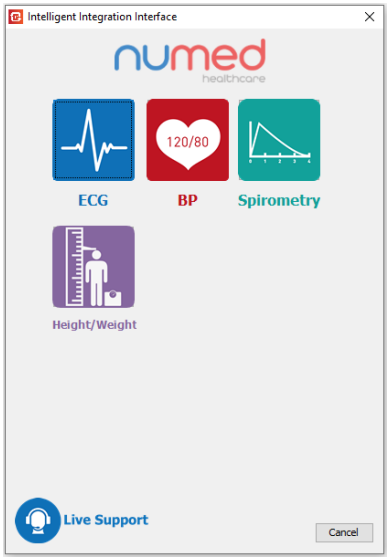
- To aid historic reports appearing correctly in the consultation timeline, the consultation date against which the PDF reports are filed will be determined by the modified date of the individual PDF files. **This may differ from the actual date of the ECG recording** if the PDF report was not created on the same day as the ECG was taken, but will be more accurate than filing all historic reports against the current date.
- PDF files sent to the clinical system will be deleted from the folder.
- Conversely, PDF files not sent to the clinical system will remain in the folder and will appear in the list again the next time the software is started.
- PDFs that are automatically linked to a patient from the filename cannot be associated with a different patient. Once a patient is associated with a PDF file, the Search button becomes inactive.
- To edit a comment before filing, click the **Add** button again.
- To remove a PDF file from the list without sending to the clinical system, delete the PDF file from the folder in Windows Explorer.

Using I³ with QRS Diagnostic Universal ECG

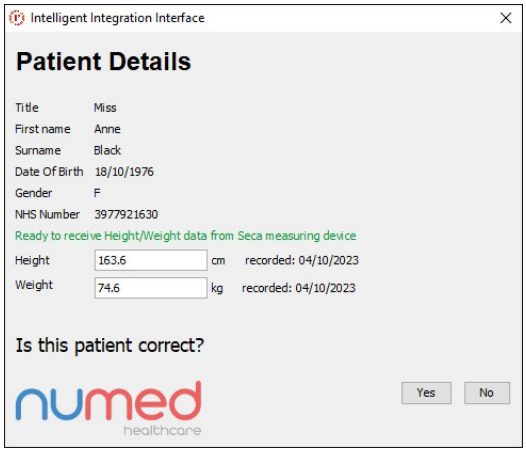
To acquire an ECG from the QRS Diagnostic Universal ECG cable and store as a PDF in the patient's notes, follow the steps below:

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

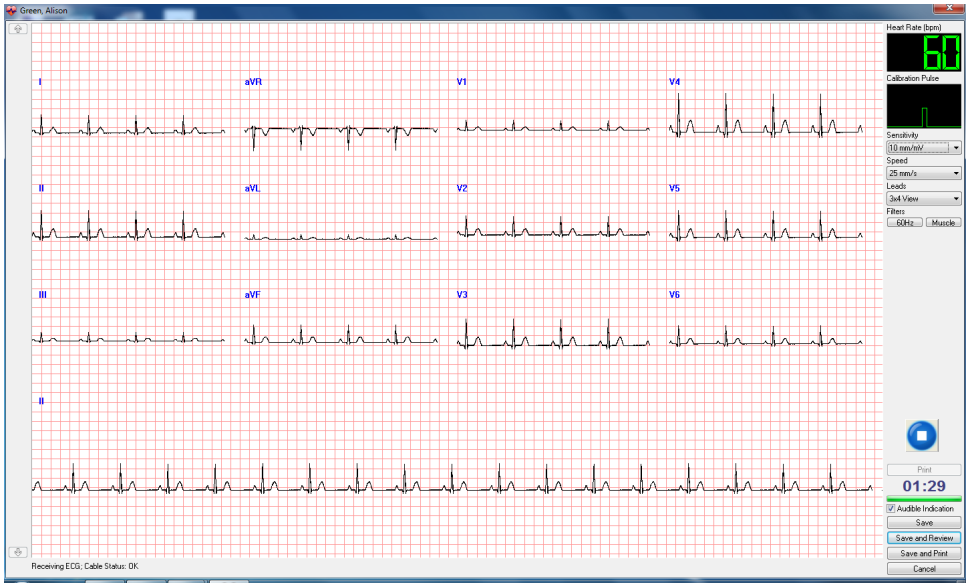
4. Click the **Start** button. The Select Product screen will appear.



5. Select the **ECG** icon. If multiple ECG products are enabled, a sub-menu will be shown – select **Universal ECG** from the list of products and click the **Start** button.
6. After a second or two, the current patient's details should be shown in a window like the one below:



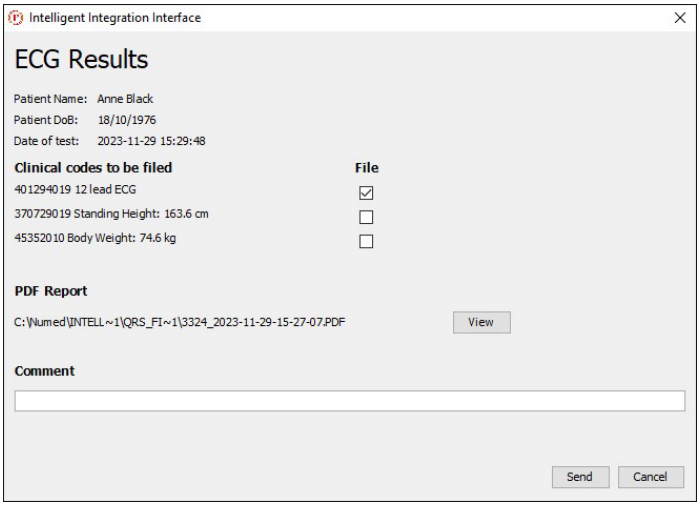
7. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
8. The ECG software will initialise and the ECG monitoring screen should appear as shown below.



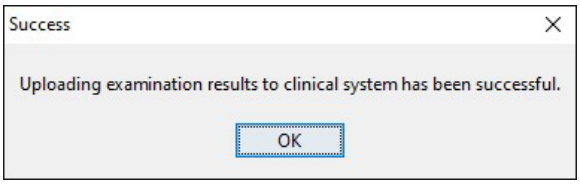
9. If any of the lead positions show the leads off indicator shown below, the lead contact requires attention.

10. When the quality of the ECG is satisfactory, click the **Save** button. There may be a delay of up to 10 seconds whilst the ECG is acquired. CardioView will exit as the acquisition completes.

18. The integration software will display the patient details and a Clinical code under which these results will be filed. The PDF report of the ECG recording can be previewed by clicking the **View** button. A comment can also optionally be added, which will be filed alongside the PDF attachment.



19. Click the **Send** button to send the results to the clinical system. Clicking **Cancel** will discard the results.
20. After a few seconds, a message showing successful filing should be displayed. If filing or upload is not successful, an error message will be shown.



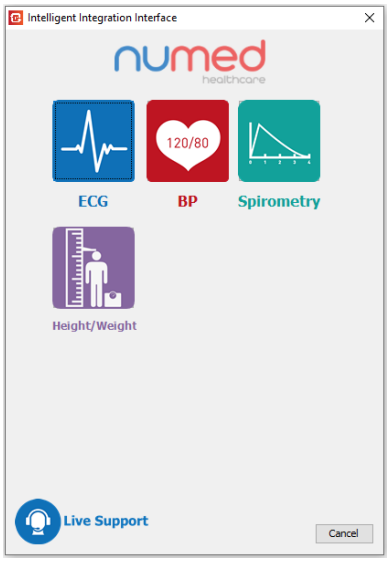
It is recommended the result is then viewed in the clinical system to verify correct filing before the patient leaves.

Using I³ with Schiller MS12-USB ECG

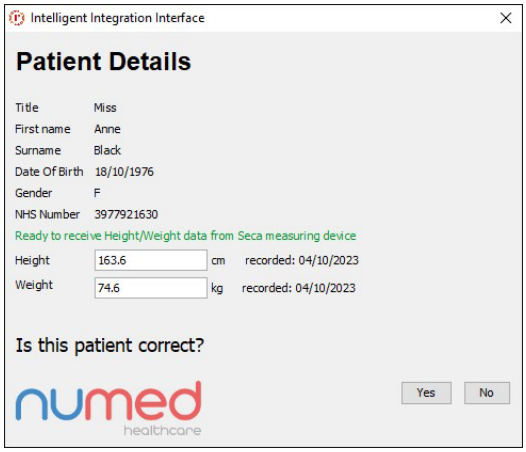
To acquire an ECG from the Schiller MS12-USB ECG cable and store as a PDF in the patient's notes, follow the steps below:

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

4. Click the **Start** button. The Select Product screen will appear.



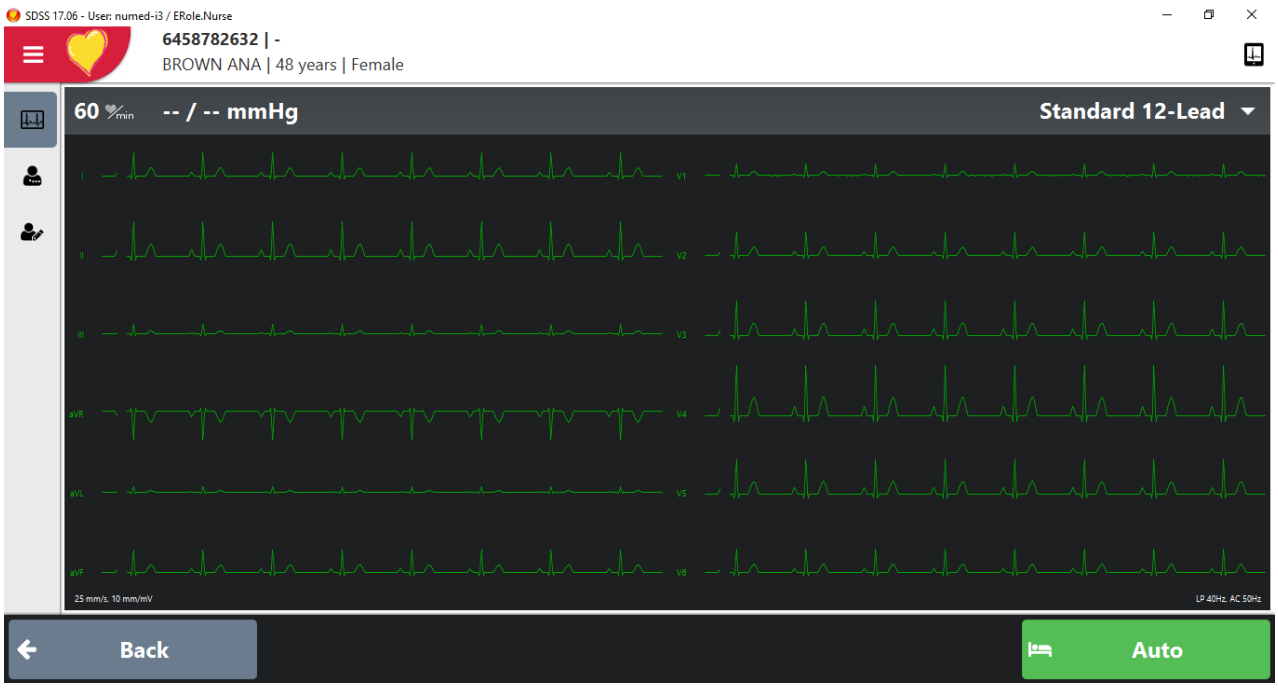
5. Select the **ECG** icon. If multiple ECG products are enabled, a sub-menu will be shown – select **Schiller CS-104** from the list of products and click the **Start** button.
6. After a second or two, the current patient's details should be shown in a window like the one below:



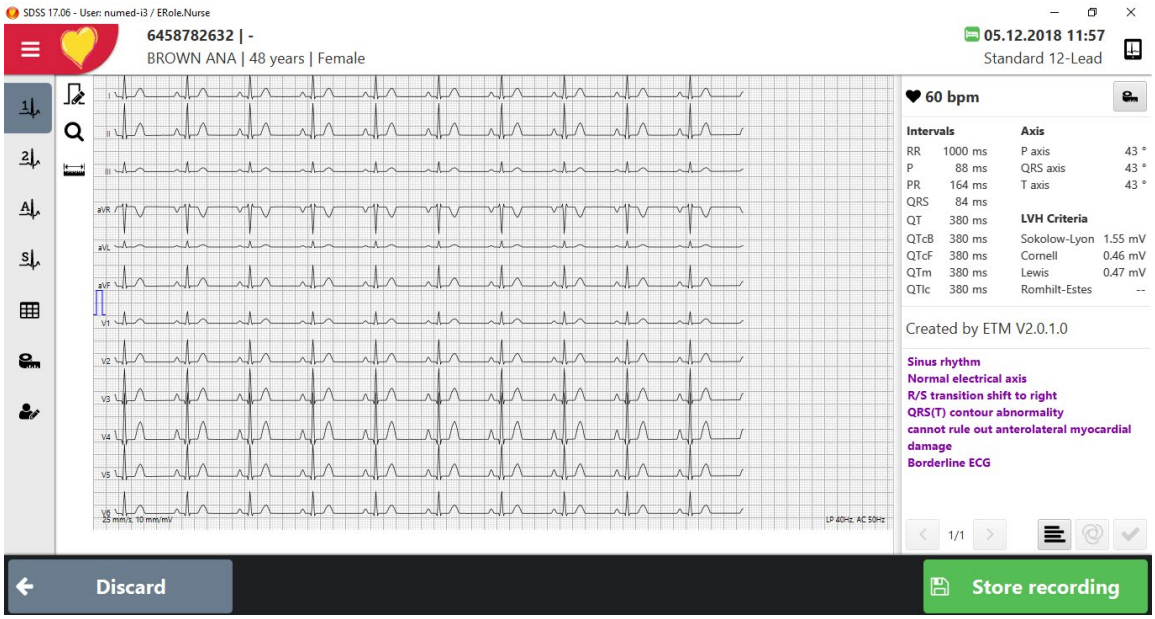
7. If Seca Height/Weight integration is in use, transmit the data from the scales now.
8. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
9. Select the type of ECG to be acquired, Rhythm Strip or standard Resting ECG.

Resting ECG Acquisition:

1. The ECG software will initialise and the ECG monitoring screen should appear as shown below.



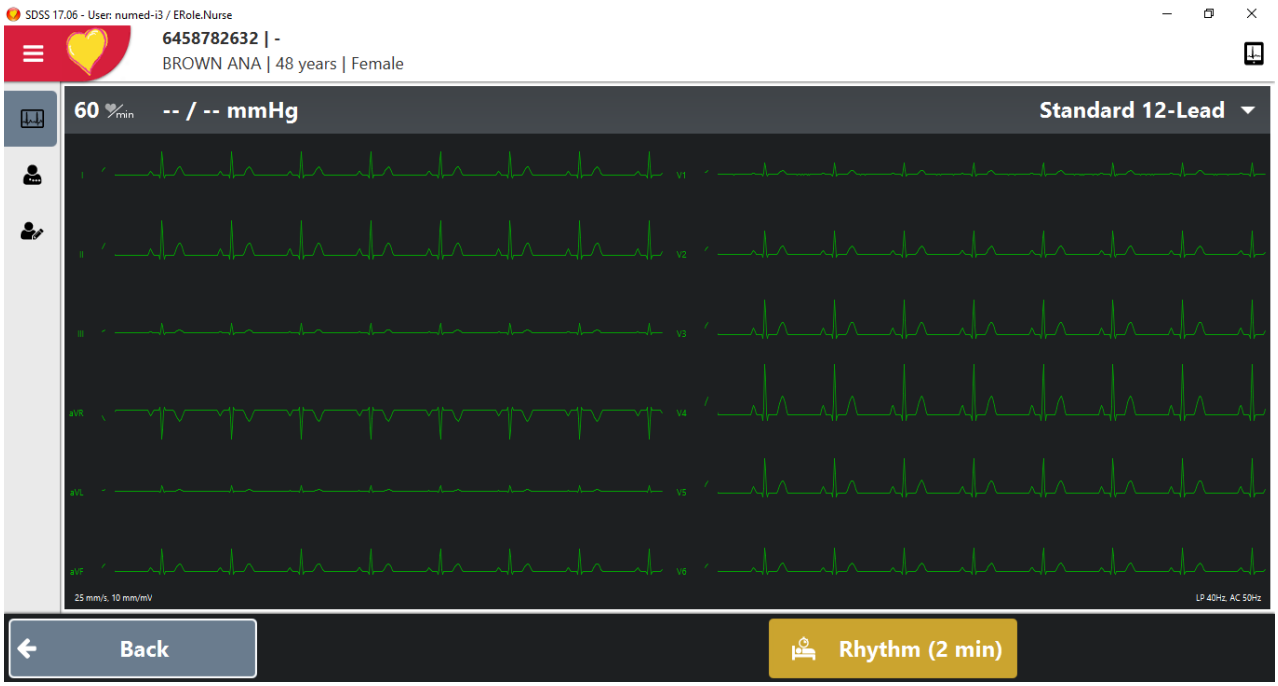
2. A poor lead connection will be shown by a yellow trace. A very poor lead connection will be shown by a red trace. A disconnected lead will show 'Lead off' in red text next to the affected lead.
3. When the quality of the ECG is satisfactory, click the **Auto** button. The blue **Start** button the ECG cable can also be used to begin the acquisition. There may be a delay of up to 10 seconds whilst the ECG is acquired.



4. The ECG acquisition summary will be shown, where the quality and interpretation can be checked. Different views are available by clicking the icons down the left side of the screen. If the quality is poor and the acquisition needs to be repeated, click the **Discard** button to return to the monitoring screen. Click **Auto** again to repeat the acquisition process.
5. Click **Store recording** to save the ECG and exit the software. Jump to **Filing the ECG** section below for details on saving the report to the patient record.

Rhythm Strip ECG Acquisition:

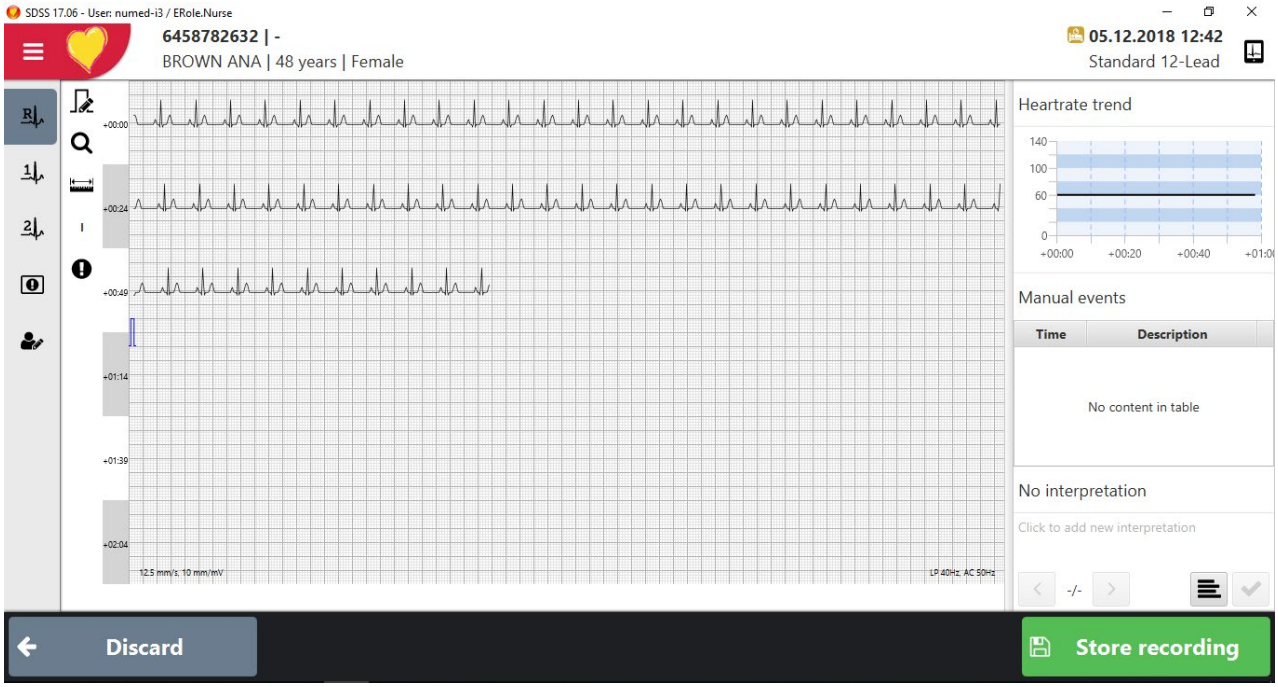
1. The ECG software will initialise and the ECG monitoring screen should appear as shown below.



2. Click the **Rhythm** button and select the required duration of the rhythm strip.
3. Click the **Start** button to commence rhythm strip acquisition.
4. During the acquisition process a countdown timer is displayed at the top of the screen.

5. The **Manual Event** button can be clicked to record an event with a comment during the acquisition.
6. The **Stop** button can be clicked to terminate the acquisition before the pre-defined period.

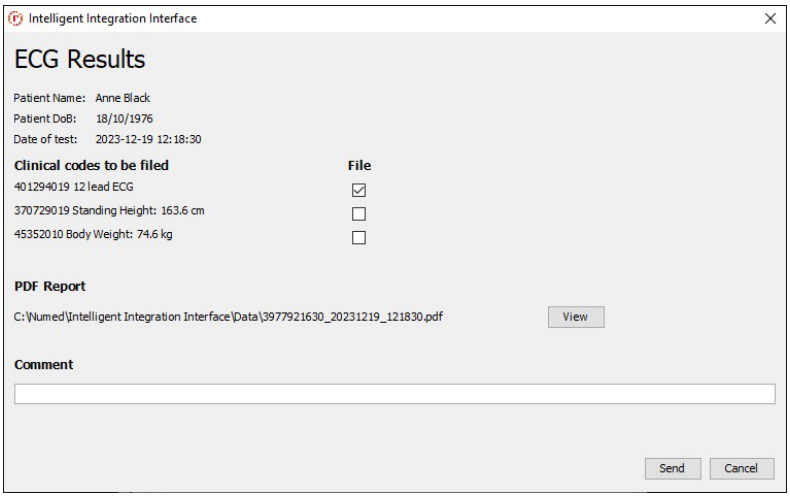
7. At the end of the acquisition, the summary page will be shown where the quality and events can be checked. Different views are available by clicking the icons down the left side of the screen. If the quality is poor and the acquisition needs to be repeated, click the **Discard** button to return to the monitoring screen. Click Rhythm button to repeat the acquisition process.



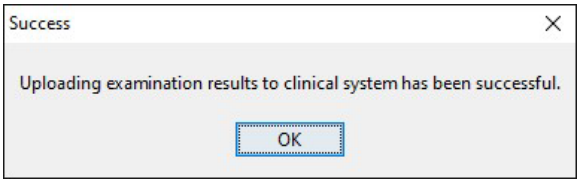
8. Click **Store recording** to save the ECG and exit the software.

Filing the ECG

1. The integration software will display the patient details and a Clinical code under which these results will be filed. The PDF report of the ECG recording can be previewed by clicking the **View** button. A comment can also optionally be added, which will be filed alongside the PDF attachment.



2. Click the **Send** button to send the results to the clinical system. Clicking **Cancel** will discard the results.
3. After a few seconds, a message showing successful filing should be displayed. If filing or upload is not successful, an error message will be shown.



It is recommended the result is then viewed in the clinical system to verify correct filing before the patient leaves.

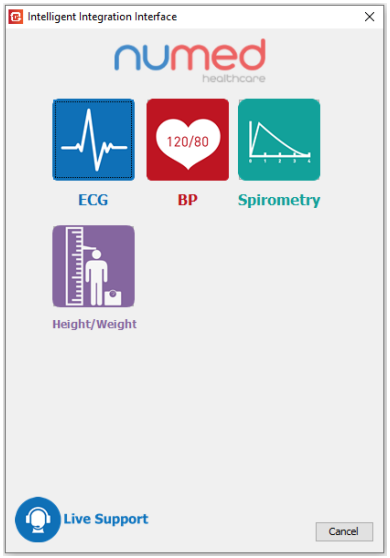
Using I³ with IEM Mobil-o-Graph Ambulatory BP Monitor

There are two distinct stages in using the Mobil-o-Graph Ambulatory Blood Pressure Monitoring system. The first is the preparation of the recorder before fitting to the patient and the second is the reading of the measurement data from the recorder after the patient returns.

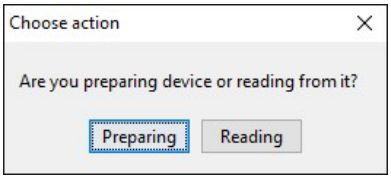
Preparation of the Mobil-o-Graph

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

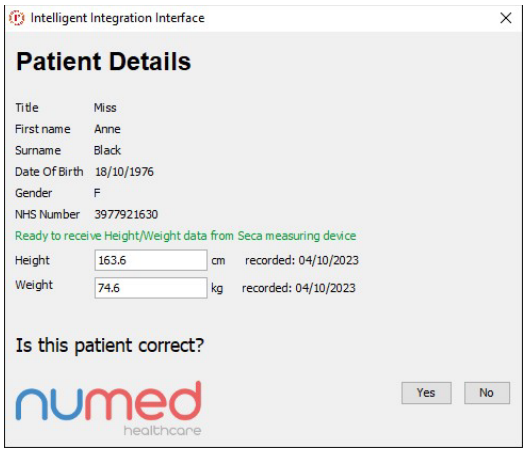
4. Click the **Start** button. The Select Product screen will appear.



5. Select the IEM Mobil-o-Graph from the list of products and click the **Start** button.
6. After a second or two, the following screen will appear asking to confirm whether you are preparing or reading data from the recorder. Choose '**Preparing**'.



7. The current patient's details will then be shown in a window like the one below:



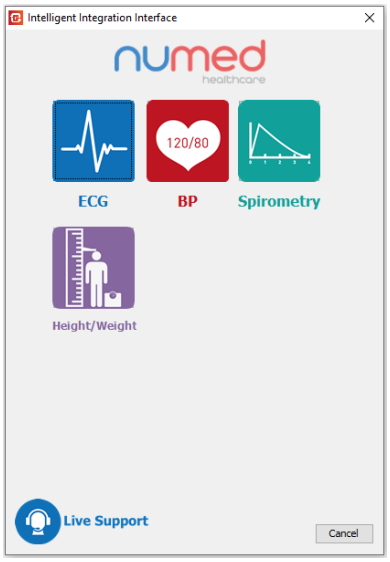
8. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
9. The HMS-CS BP software will open with the correct patient details loaded.
10. Connect the Mobil-o-Graph recorder to the PC and power on the device. CO should appear on the display to indicate communication mode.
11. Click on the Prepare Recorder icon 
12. Select the protocol required and set the date time of the device.
13. Send the Patient ID and the protocol to the device.
14. Exit the HMS-CS BP software. You will be presented with a GDT export window as shown below. Select no GDT transfer and click OK.

15. The preparation of the device is now complete. The device is ready for fitting to the patient and the first manual test performing to initiate the automatic readings.

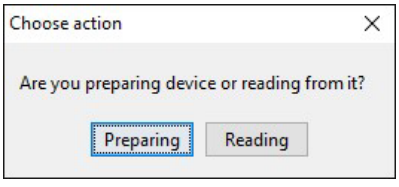
Reading the Measurement Results from the Mobil-o-Graph

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

4. Click the **Start** button. The Select Product screen will appear.

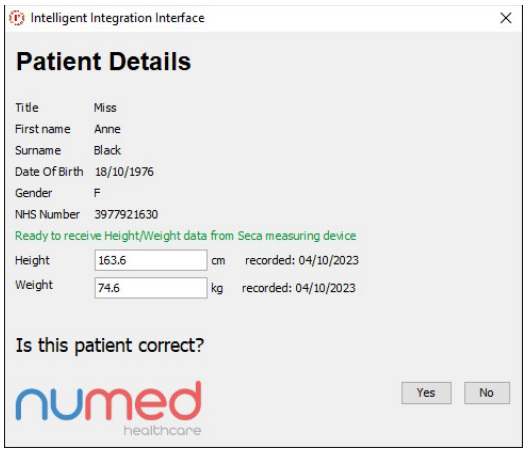


5. Click on the **BP** button from the list of products and click the **Start** button.
6. After a second or two, the following screen will appear asking to confirm whether you are preparing or reading data from the recorder. Choose '**Reading**'.

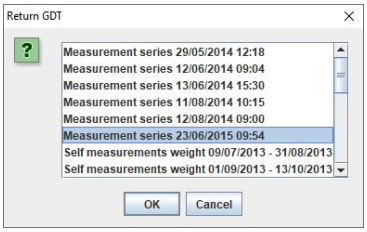


7. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.

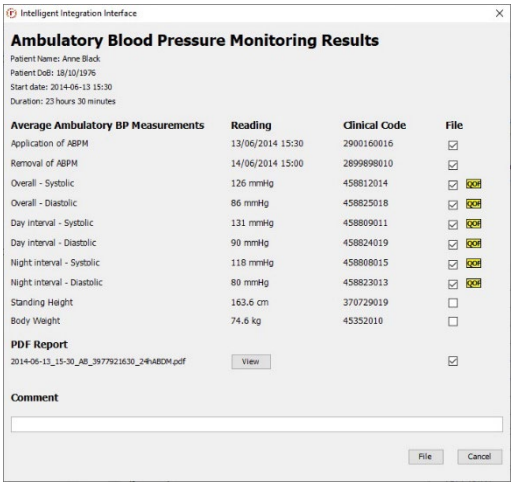
8. The current patient's details should be shown in a window like the one below:



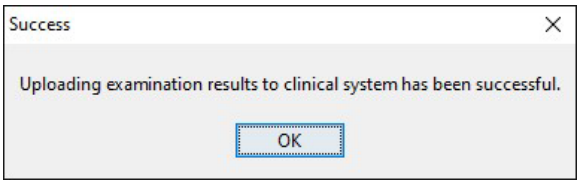
9. The HMS-CS BP software will open with the correct patient details loaded.
10. Connect the Mobil-o-Graph recorder to the PC and power on the device. CO should appear on the display to indicate communication mode.
11. Click on the Read Data from Recorder icon 
12. When the transfer of the results is complete, exit the HMS-CS BP software.
13. If the newly downloaded results are selected these will be exported automatically. If any other previous results have been viewed, you will be offered a list of available results to export in a window like the one below. Click on the results you would like to export and click OK. **Note:** this window will only be seen if other historic results are viewed after the results are transferred from the Mobil-o-Graph.



14. The integration software will display a list of available results and the Clinical codes under which these results will be filed. Any available results can be selected or deselected for filing. Also available for selection and previewing is the associated PDF report of the BP measurements. All available values will be selected by default unless altered in the program settings menu. A comment can also optionally be added, which will be filed alongside the PDF attachment.



15. Click the **File** button to begin the uploading of the results to the clinical system. This could take a few seconds depending upon network speed. A successful message will be displayed when the process completes successfully.



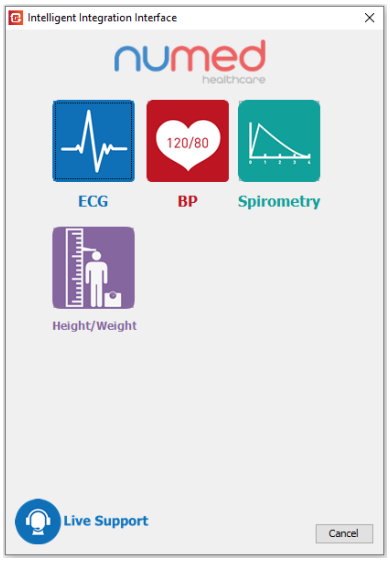
16. It is recommended the results are viewed in the clinical system to confirm success. Depending on the clinical system, this may require the patient record to be deselected and reselected in order to refresh the data.

Using I³ with MedChip SpiroConnect Spirometer

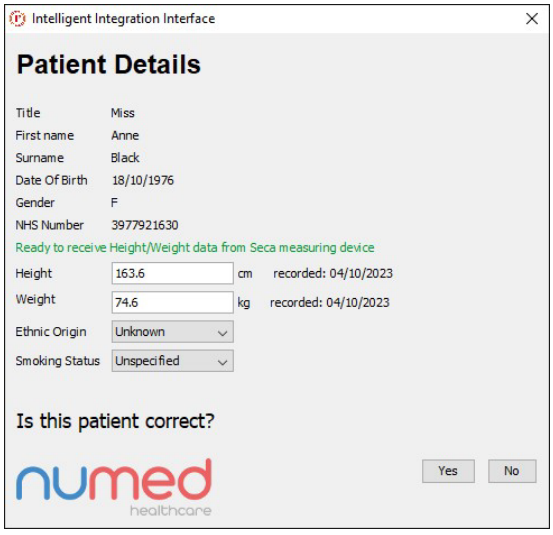
To perform a spirometry test using the MedChip SpiroConnect Spirometer and store a PDF report of the results in the patient's notes along with a selection of Clinical coded measurement data, follow the steps below.

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

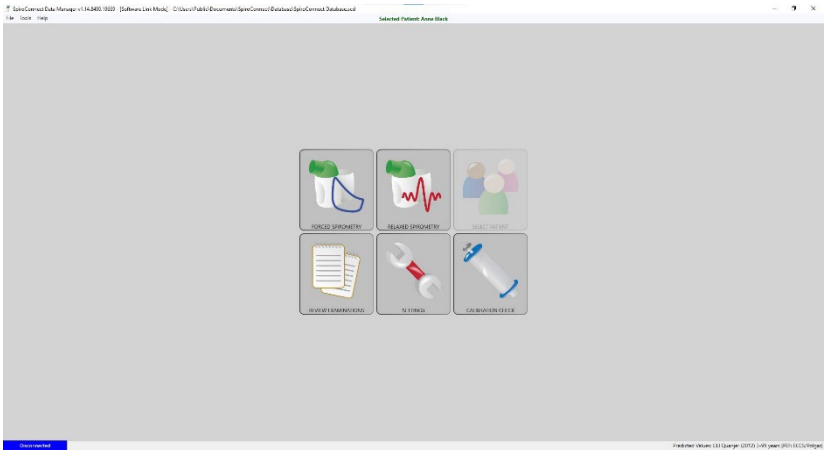
4. Click the **Start** button. The Select Product screen will appear.



5. Select the **Spirometry** icon.
6. After a second or two, the current patient's details should be shown in a window like the one below:



7. Check the **Height** and **Weight** details are correct. If previously recorded in the clinical system, the most recent recordings will be displayed and the date those recordings were taken, provided this setting is enabled in the **Configuration Settings**
8. Select the **Ethnicity** and the **Smoking Status** of the patient. Depending on the clinical system in use, these may be retrieved from the clinical system.
9. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
10. As the Spirometry software opens, select the test required.

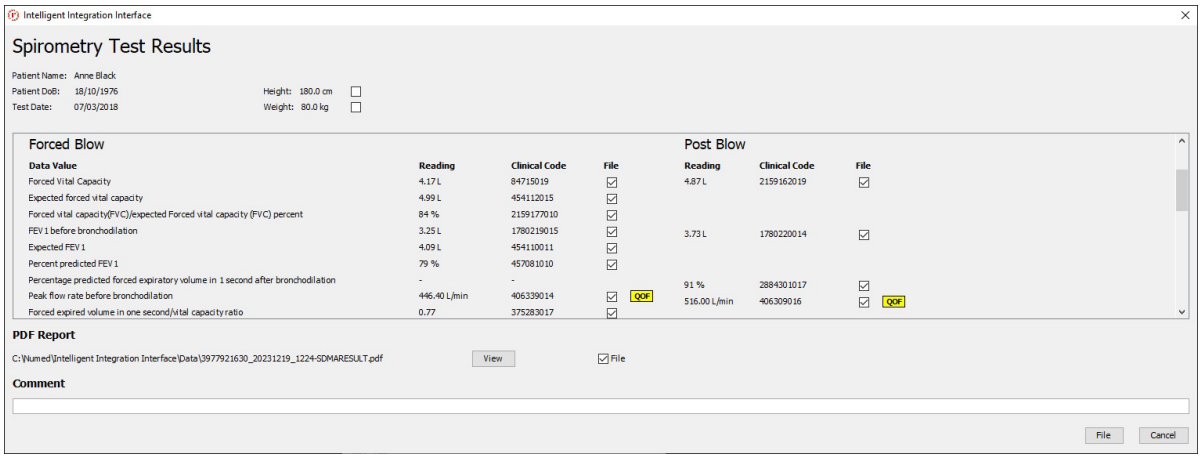


11. Perform the tests required. When complete, exit the Spirometry software by clicking the cross in the top right corner.
12. A list of the results available for filing to the patient record in the clinical system will then be displayed (see next page). It may be necessary to scroll to see all the results.

    To prevent the filing of any particular data, de-select the relevant tick box.

    Data showing as **n/a** is not available to be filed in the clinical system in use. Data with a greyed out tick box is either not available in the clinical system in use, or has not had the data value measured by the Spirometry software.

    Optional additional codes are available for user selection, such as COPD and Asthma monitoring codes.
    To file a COPD Clinical code for **Oxygen Saturation at Periphery**, the percent oxygen saturation value must first be entered in the box provided.



The PDF report can be previewed by clicking the **View** button. The PDF must be closed before the data can be filed.

A comment can be added to be filed alongside the attachment by typing in the **Comment** box.

If no Post BD test data is detected, the user is given the option of filing the results immediately or filing later after the Post BD tests are performed. This permits the full set of readings to be filed in to one entry in the patient record. Post BD readings must be performed **within 1 hour** of the forced spirometry tests for the results to be combined.

If Post BD data is detected, then only the **File** and **Cancel** options are available. Click the **File** button to send all selected results to the patient record in the clinical system. A confirmation message will be displayed upon successful filing. The length of time taken to file the results will vary depending on the clinical system in use, the speed of the network and the number of data values selected for filing (the more data values, the longer it will to file).

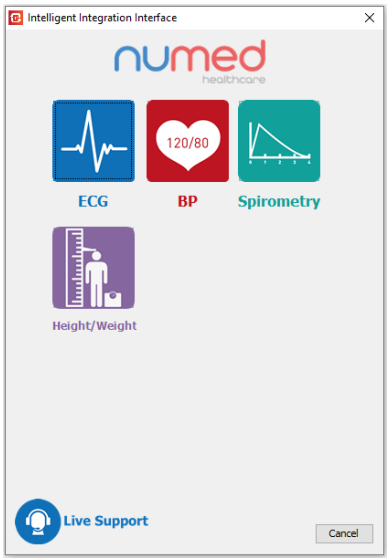
Please note that any Clinical codes that are disabled in the **Configuration Settings** will not be shown on the Test Results screen.

Filing Historic Results

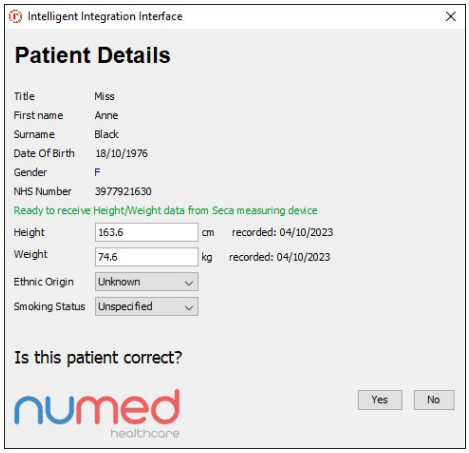
It is possible to retrospectively file spirometry results previously saved in the Spirometry software but not sent to the clinical system. This feature is useful if, for example, the clinical system was temporarily unavailable at the time of performing the test. Follow the steps below to file historic results.

1. Find and select the patient within the clinical system.
2. Start the I^3 software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

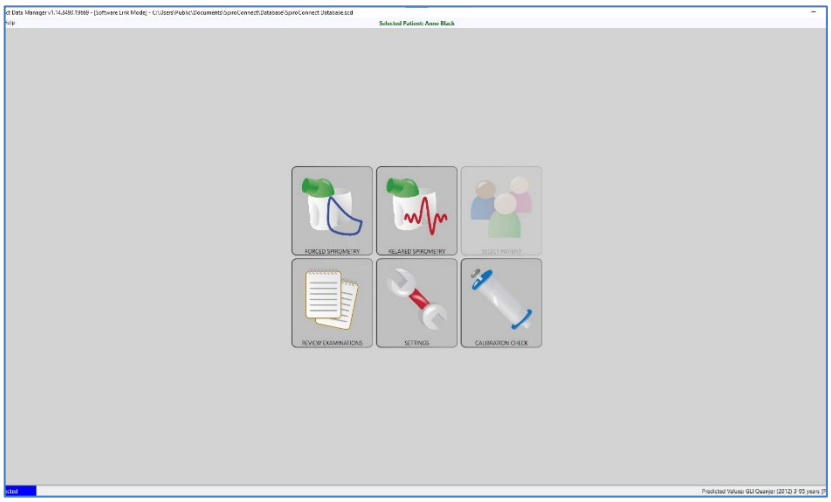
4. Click the **Start** button. The Select Product screen will appear.



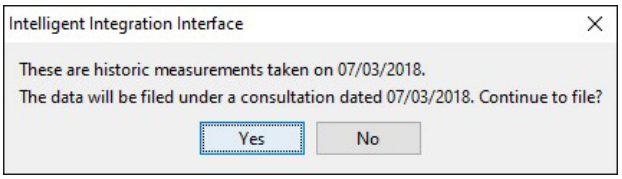
5. Select the **Spirometry** icon.
6. After a second or two, the current patient's details should be shown in a window like the one below:



7. Check the **Height** and **Weight** details are correct. If previously recorded in the clinical system, the most recent recordings will be displayed and the date those recordings were taken, provided this setting is enabled in the **Configuration Settings**
8. Select the **Ethnicity** and the **Smoking Status** of the patient. Depending on the clinical system in use, these may be retrieved from the clinical system.
9. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you only have one copy of the clinical system software open.
10. As the Spirometry software opens, select the **Review Examinations** button.



11. A list of available test results for the patient will be shown. Click on the test results to be filed and click the **Mark for I3 Export** button in the bottom right corner.
12. Exit the Spirometry software.
13. A warning message will be displayed notifying these are historic results. Note that the results will be filed against a consultation dated the same as the results, not the current date.



14. A list of the results available for filing to the patient record in the clinical system will then be displayed (as shown in the previous section). It may be necessary to scroll to see all the results.
15. Send the results to the clinical system by clicking the **File** button.

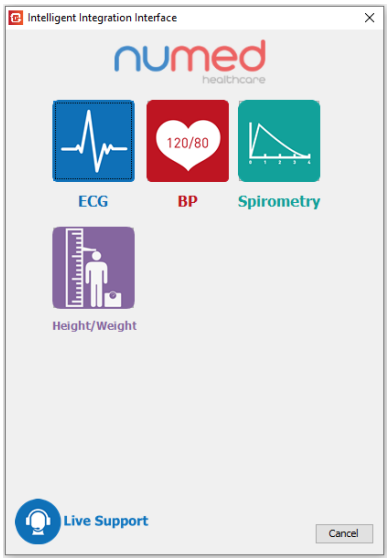
Using I³ with NDD EasyOne Connect and Trueflow Spirometer

Note: The NDD EasyOne Connect with Trueflow Spirometer integration is currently only available for use with the Vision clinical system.

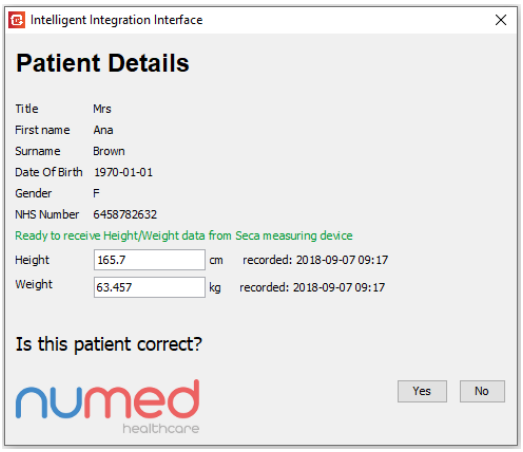
To perform a spirometry test using the NDD Trueflow Spirometer and store a PDF report of the results in the patient's notes along with a selection of clinically coded measurement data, follow the steps below. *Please note the following instructions give a brief overview of the use of the EasyOne Connect software. Full operational details can be found in the separate operator's manual for that software.*

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

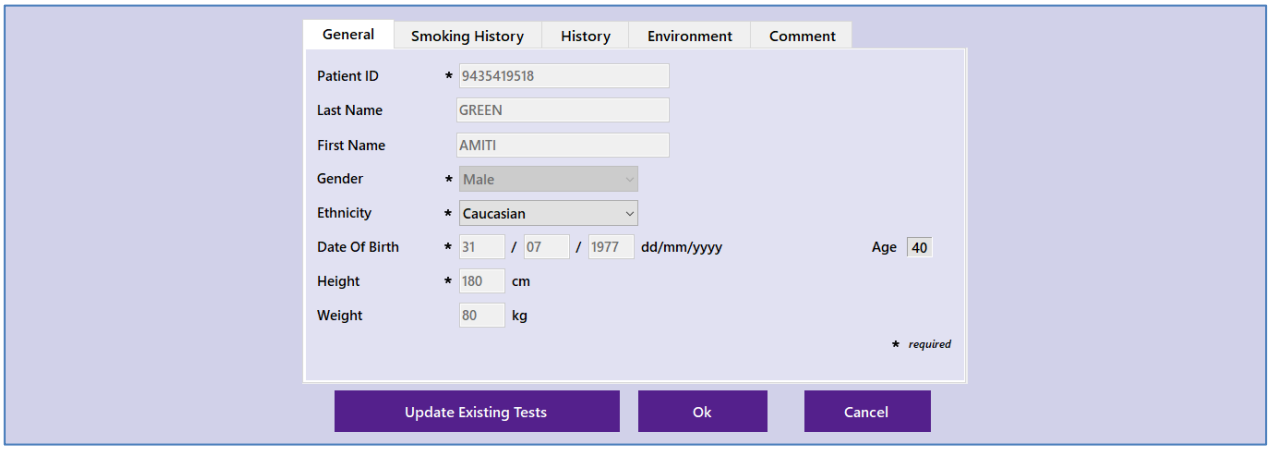
4. Click the **Start** button. The Select Product screen will appear.



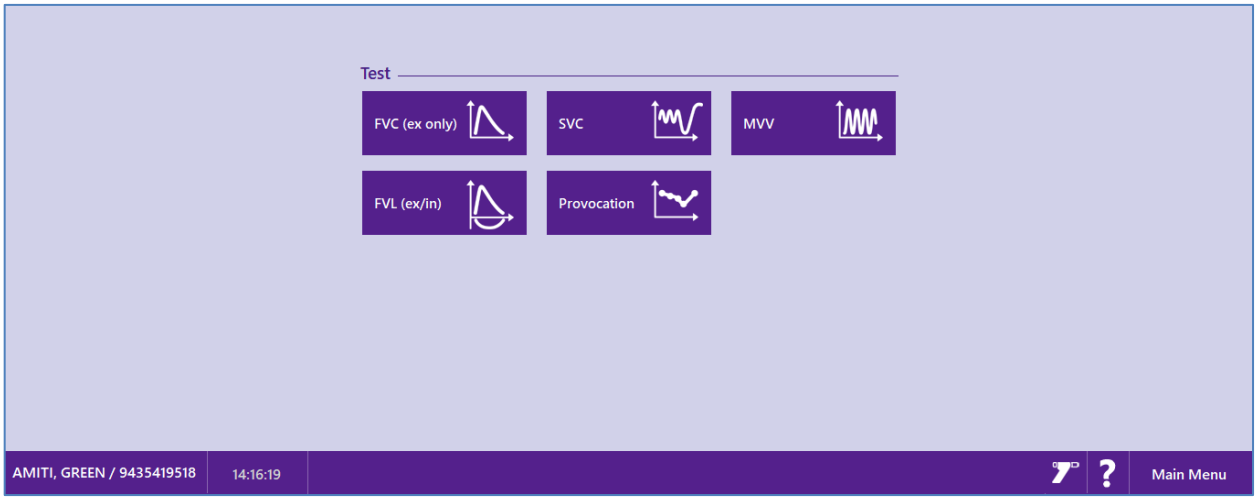
5. Select the **Spirometry** icon.
6. After a second or two, the current patient's details should be shown in a window like the one below:



7. Check the **Height** and **Weight** details are correct. If previously recorded in the clinical system, the most recent recordings will be displayed and the date those recordings were taken, provided this setting is enabled in the **Configuration Settings**
8. Click **Yes** to confirm the patient details are correct. If the patient details are not correct click **No** and ensure you have only one copy of the clinical system software open.
9. As the Spirometry software opens, select the **Ethnicity** and the **Smoking Status** (under Smoking History tab) for the patient. Mandatory fields are marked with an asterisk. You cannot proceed until all mandatory fields are completed. Most of these will be completed automatically.
10. Click OK when all fields are completed.



11. Select the test required.



To perform a relaxed blow (also known as Slow Vital Capacity (SVC) or just Vital Capacity (VC)), click the **SVC** button.

To perform a forced blow, click the **FVC** button.

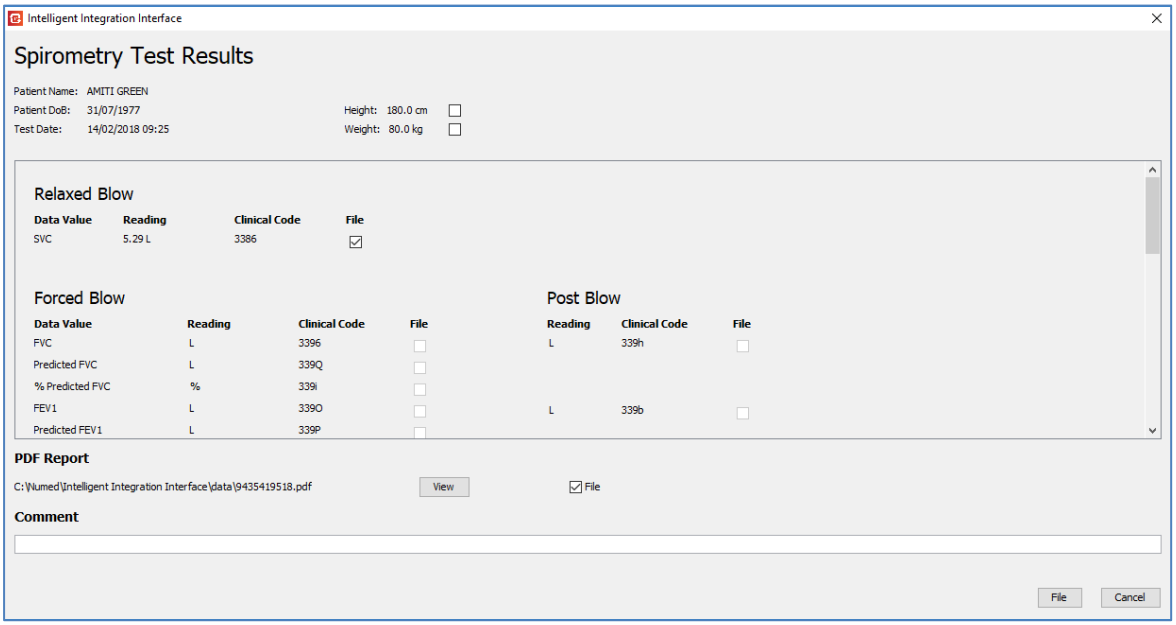
To perform a Maximum Voluntary Ventilation, click the **MVV** button. *Note: Maximum Voluntary Ventilation (MVV) is a measure of the maximum amount of air that can be inhaled and exhaled within one minute. This test is not generally performed in the UK. See product full user manual for further details of other test types.*

12. **Relaxed Blow (SVC)** *Skip this section if not performing a relaxed blow*

    a. Follow the on-screen instructions to perform the spirometry measurements.

    b. When the tests are completed, click the **Finish** button in the bottom right corner of the screen.

    c. The Spirometry software will exit and a PDF report of the relaxed blow will now be created in the background. After a few seconds, the following screen will appear.



On this screen, you have the option to perform the following actions:

View: Allows the PDF report to be previewed prior to filing.

Comment: You can enter your own comment to be filed alongside the Spirometry attachment in the patient record.

File: This sends the PDF Spirometry report to Vision and attaches it to the medical record of the patient. The software should report back after a few seconds that the Spirometry has been sent successfully. Any relevant Clinical Codes selected in the software options will also be filed in to the patient record.

Cancel: Discards the PDF Spirometry Report and exits the program without saving anything to the patient record. A message will be displayed asking for confirmation of exit without filing.

If you attempt to close this window with the cross in the top right corner, you will receive a warning that the Spirometry Report has not been sent to Vision and the option to exit without saving or return to this window and Send.

IMPORTANT NOTE: Once the Spirometry has been sent, to view the attached Spirometry and Clinical Code(s) in Vision it will be necessary deselect and re-select the patient in the Vision system. This is a limitation of the Vision system and not a malfunction of the I^3 software.

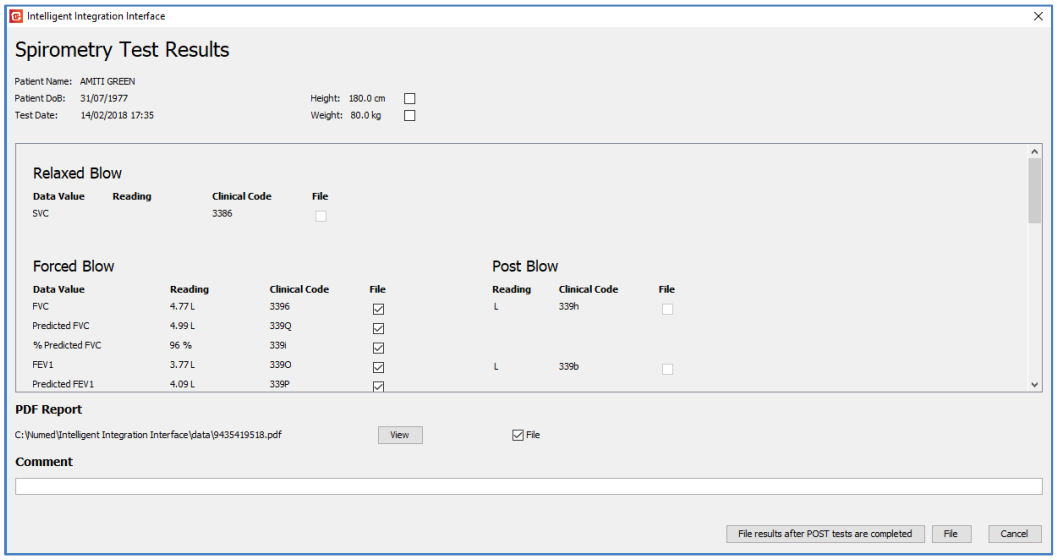
13. The software will return to the I^3 patient details confirmation window. To continue and perform a Forced test, click the **Yes** button to confirm the details and start the Spirometry software again. If you do not wish to perform any further tests, click the **No** button.

14. **Forced Blow (FVC)**

a. Follow the on-screen instructions to perform the spirometry measurements.

b. When the tests are completed, click the **Finish** button in the bottom right corner of the screen.

c. The Spirometry software will exit and a PDF report will now be created in the background. After a few seconds, the following screen will appear.



d. On this screen, you have the option to perform the following actions:

Comment: You can enter your own comment to be filed alongside the Spirometry attachment in the patient record.

File: This sends the PDF Spirometry report to Vision and attaches it to the medical record of the patient. The software should report back after a few seconds that the Spirometry has been sent successfully. Data values available for filing to the medical record are shown. Any values ticked will be filed as Clinical Codes in the patient record.

File results after Post Tests are completed: If you will be performing POST-BD tests, select this option to the results after the POST-BD tests are completed. Note: This button is only visible if no POST-BD tests are detected in the results. ***IMPORTANT NOTE:*** *POST BD tests* ***MUST*** *be performed on the same day as the initial test; otherwise this will be regarded as a completely new test.*

Cancel: Discards the PDF Spirometry Report and exits the program without saving anything to the patient record. A message will be displayed asking for confirmation of exit without filing.

If you attempt to close this window with the cross in the top right corner, you will receive a warning that the Spirometry Report has not been sent to Vision and the option to exit without saving or return to this window to File.

15. **Forced Blow (POST BD)**

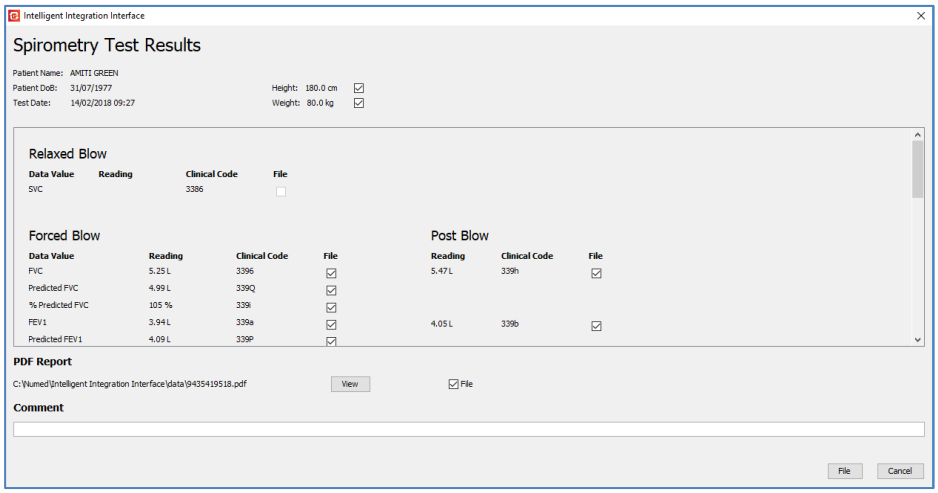
a. When performing a POST BD test on the same day as the initial test was done, find the patient in the clinical system start the I³ software.

b. When the EasyOne Connect software opens, select the FVC test. You will then be presented with a dialogue box giving various options for the test. Choose **Add Post** test.

c. Follow the on-screen instructions to perform the spirometry measurements.

d. When the tests are completed, click the **Finish** button in the bottom right corner of the screen.

e. A PDF report will now be created in the background. After a few seconds, the following screen will appear.



Data showing as **n/a** is not available to be filed in the clinical system in use. Data with a greyed-out tick box is either not available in the clinical system in use, or has not had the data value measured by the Spirometry software.

Optional additional codes are available for user selection, such as COPD and Asthma monitoring codes. To file a COPD Clinical code for **Oxygen Saturation at Periphery**, the percent oxygen saturation value must first be entered in the box provided.

f. Click the **File** button to send the results to the clinical system. You can optionally add a **Comment** to file with the report attachment. Clicking **Cancel** will exit the software without making any attachment to the patient record in the clinical system.

IMPORTANT NOTE: Once the Spirometry has been sent, to view the attached Spirometry and Read Code in Vision it will be necessary to come out of the consultation and go back in. This is a limitation of the Vision system and not a malfunction of the I³ software.

Please note that any Clinical codes that are disabled in the **Configuration Settings** will not be shown on the Test Results screen.

Seca Height / Weight Integration

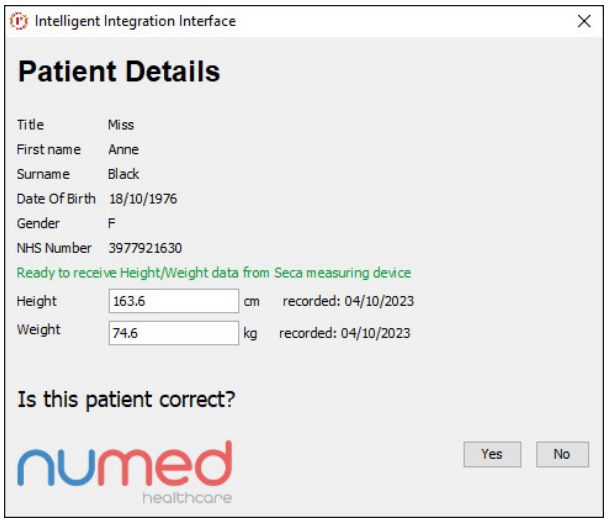
It is possible to receive height and weight data wirelessly from compatible Seca measuring devices. The devices must be **Seca 360º Wireless** compliant – contact our sales team or see the Seca website for full details of compatible systems.

Data is received on the PC through the Seca 456 USB Wireless Receiver. Once connected, the wireless receiver must be enabled in the I³ configuration settings – see **Configuration Settings Common to all Clinical Systems** section. The Seca 360º Wireless group must then be correctly configured; please refer to the Seca user manuals for details or contact Numed Technical Support for assistance.

The height and/or weight data can be received as part of a diagnostic test (ECG, BP or Spirometry). Additionally, the height and/or weight data can be received and filed to the clinical system independently of a diagnostic test. To use the latter function, an active licence must exist for one or more of the diagnostic products.

Receiving Height and Weight Data prior to a Diagnostic Test

When using the diagnostic products, green text will be displayed notifying the user when the I³ software is ready to receive data from the Seca measuring devices. Pressing the **Send** button on the Seca device will transmit the data. As I³ receives the data, the reading will update and green text next to the measurement will show the time of receipt. The data can be re-sent from the Seca device any number of times whilst this screen is displayed.

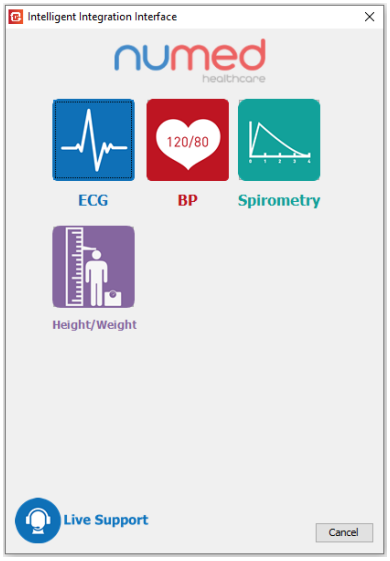


Receiving and filing Height and Weight Data without a Diagnostic Test

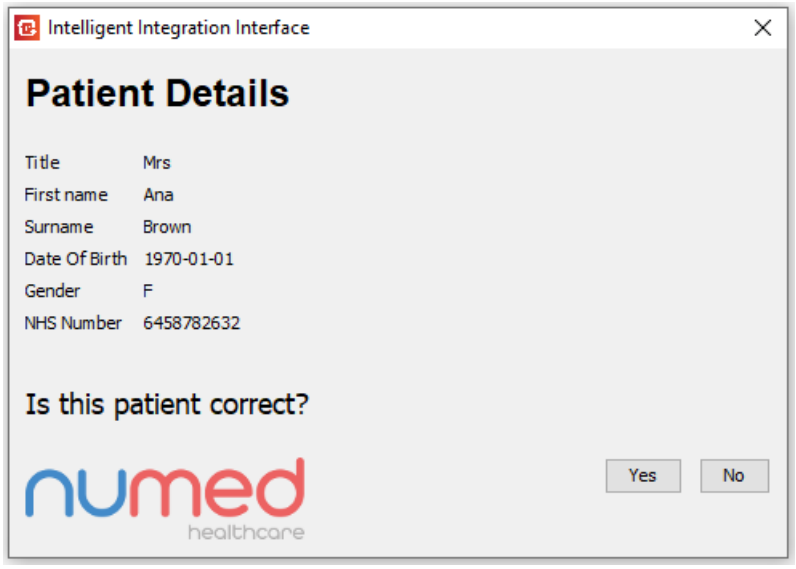
To acquire Height and or Weight readings from the Seca measuring device and file the data in the patient's notes, follow the steps below:

1. Find and select the patient within the clinical system.
2. Start the I³ software from the desktop shortcut.
3. As the software starts, the following screen will be shown:

4. Click the **Start** button. The Select Product screen will appear.

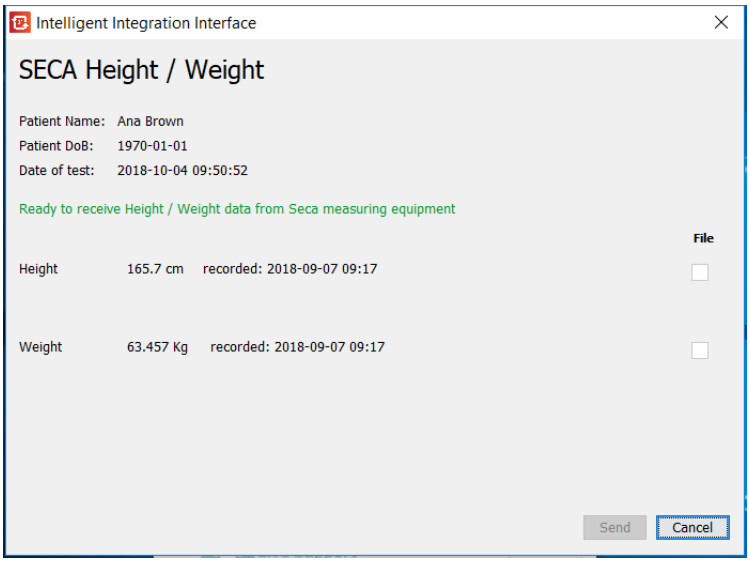


5. Click the **Height/Weight** button.
6. After a second or two, the current patient's details should be shown in a window like the one below:

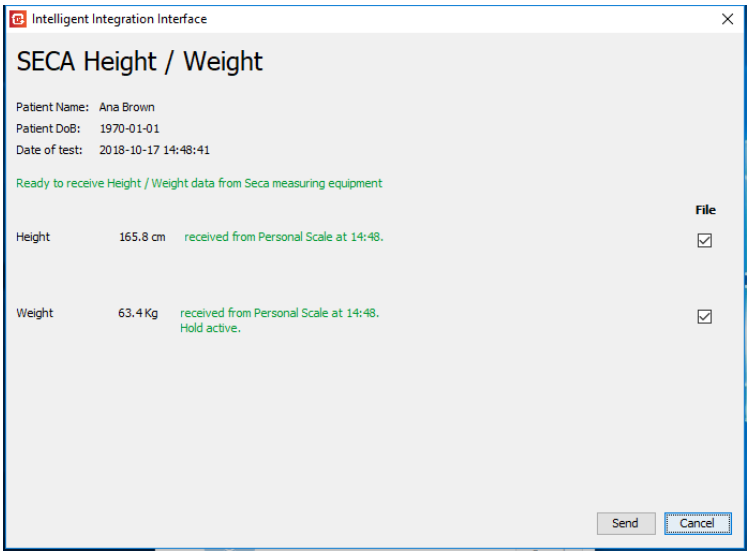


7. Verify the patient details are correct and click the **Yes** button.

8. The following screen will appear, showing the most recent measurements from the patient record (if available).



9. The software is now ready to receive data from the measuring device. Weigh and/or measure the patient and press the **Send** button on the **Seca measuring device**. (Note the send button within the software will not be available until new data is received).
10. The measurement data received will be shown. Green text next to the data will show the time the data was received and the type of device from which it came.

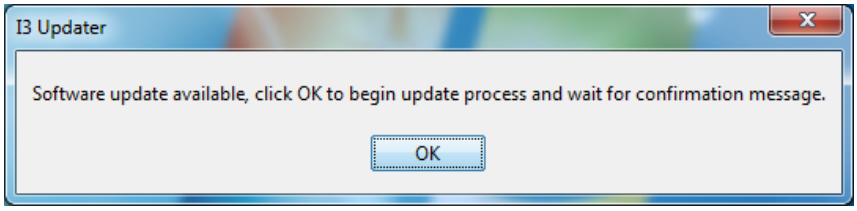


11. The data can be transmitted again from the Seca device if necessary any number of times.
12. To accept the data displayed and file to the patient record, click the **Send** button on the software results window. To discard the measurements, click the **Cancel** button.

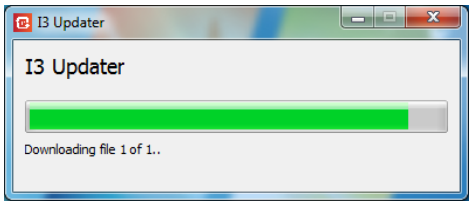
Software Updates

Software updates are automatically detected and installed over the Internet when the software is started. If the update server cannot be contacted, a message will be displayed notifying of this.

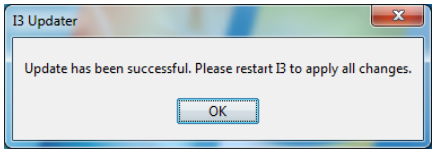
If a software update is detected, the following message will be seen.



Click **OK**. The update will begin and a progress bar will be shown.



As the update completes, the following message should be shown:



Click **OK** and start the software again to apply the update. In the event of a software update failure message, please contact Numed Healthcare Technical Support for advice and assistance.

Help and Support

Numed Healthcare offers assistance with product training and technical support.

For **technical support** or **training advice**, please contact:
0114 399 0010 or support@numed.co.uk
Opening hours: 8am – 5:30pm, Monday – Friday

Live Support is available 8am – 5:30pm, Monday – Friday. Click on the Live Support button on the Product Selection screen or the Product Licensing screen to initiate the session.

Live Support is not available when using the GDT Interface (Eg. Socrates, Helix, HEALTHone clinical systems). Please contact your local distributor in the first instance for technical support.

Our support lines will be closed on public holidays in England.

Software Version History

Version	Change Detail	Release Date
V2.1.0_239	Fixed bug with MAC PDF Filer file list not being populated when SystmOne selected as clinical system.	21/10/24
V2.1.0_243	SystmOne Connectivity bug fix. Non-writeable AppDir fix. Various security fixes.	12/1/26
V2.1.0_248	Updated underlying version of OpenJDK to version 8. Improved compatibility with Cardioview v7.0.7 Added Community Licence which enables all modules and removes licences for any single modules. Updated Managed Products & default ECG settings to remove legacy products. Updated default products selected and default settings for Schiller. Relocated SBIN config file to C:\ProgramData\Numed\i3 - was previously erroneously stored in C:\ProgramData. Default Java Certificate Authority Stored Password updated. Minor bug fixes.	27/2/26