

# ONE LAPTOP PER RWANDESE CHILD

One laptop per child is an ambitious project! The project's mission is to create educational opportunities for the world's poorest children by providing each child with a rugged, low-cost, energy efficient laptop. This project is not about ICT. It is about Education!

The principal is to engage children in their learning, improving the Educational System. The XO laptop is an educational tool designed to be put into the hands of every child. Children around the world use computers to many different things: to play, to write to their friends and siblings, to do research, but most importantly, to express themselves in creative ways and to learn how to think critically.

Children around the world are **natives** in the information society. Children are connected to the world and the world is connected with them. More than that, they use computers to solve their problems and one day might use them to solve ours.

Children in Rwanda, as in everywhere, don't lack capability! They lack opportunity and resources! With this laptop we hope to introduce children here to this new digital world, so they also become **native** speakers of the language of computers. This way, when they grew up, they are going to be able to discuss with children from other countries in the same level.

However, in order for children to become digital **natives**, they need to be exposed to laptops since the early age, and that is why OLPC focus in primary education. They also need to use the laptops everyday, many hours per day, and that is why children should take laptops home. If they use computers just a few hours per week, like in a computer lab, they are going to be in tremendous disadvantages with children from other cultures where computers are part of their everyday life.

Imagine how our students are going to be in 10 years from now, if they use laptops everyday. They will definitively won't be immigrants in the digital world, but they will speak natively the language of the future.

## WHAT YOUR XO CAN DO



### Write

Try writing collaborative stories, poems or anything in an easy and simple way.



### Record

Take photos or make videos of anything you want at any time for your own art exhibit or illustrate the pages of a newspaper.



### Browse

Learn surfing the Internet quickly and securely.



### Scratch

Discover the pleasure of creating your own story or game while you learn important mathematical concepts.



### Etoys

Make collages and interactive books at the same time developing their skills in mathematics and logic.



### Speak

Speak is a talking face for the Sugar. Anything you type will be spoken aloud using the speech synthesizer, espeak. You can "speech" chat with other users and ask any question Speak robot



### Memorize

Memorize is an Activity to create Memory Games. It helps you to memorize any kind of simple association. It is a great tool when children create their own games.



### Wikipedia

Wikipedia is the most famous encyclopedia in the Internet. The Wikipedia activity allows you to access its content even when you don't have Internet. Great for research!



### Turtle Art

TurtleArt is geometry program where you teach a little turtle how to draw. It allows the children to create a correspondence between their body and the abstract geometry.



### Paint

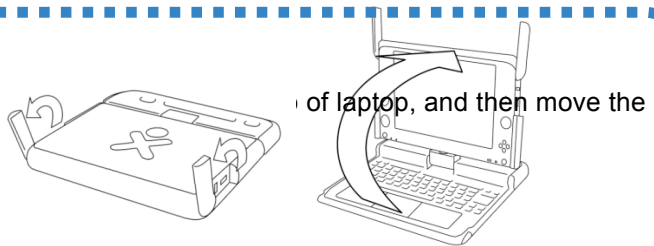
Paint is an Activity to draw whatever you want. Very good to create illustrations, maps and whatever the child imagination allows. It also offers several geometric shapes.

# SAY HELLO TO THE XO



## TO OPEN YOUR XO

Rotate both of the antennae towards you and lift the top upward away from you.



## YOUR KEYBOARD

**Shift Key**, hold shift key and a letter to do a capital letter

**Space Bar**, to put space between words



**Frame Key**

**Erase Key**, to erase letters

**Enter Key**, to create new paragraphs

# CARING FOR YOUR XO

Although your XO is a computer unlike any other, designed specific for tough conditions and remote areas, it is not indestructible. It is necessary to take care of it, so it doesn't break and also last longer. If you take good care of your laptop, it will last up to 5 years or more.

Here are some tips for taking care of it:



Carry it carefully to avoid dropping it. The screen is easy to be broken.



Don't step on it or sit on it.



If you stop to use the laptop during the break time, keep it close and in a safe place.



Do not dip it into water. If it gets wet, such as from rain, let it dry completely before using it.



Take care of the charger. Don't pull the cable to unplug. Keep the charger cord roll up, without strength to much, when you are not using it.



Don't use cutting objects to clean the keyboard.  
If it gets dirty, wipe it with a damp cloth and dry it.



In the way to school-home and home-school, keep your laptop inside a bag to avoid to be stolen. If possible, walk together with a older brother or in groups.



Don't put your XO close to the fire or any heat source. The battery may cause a small explosion.



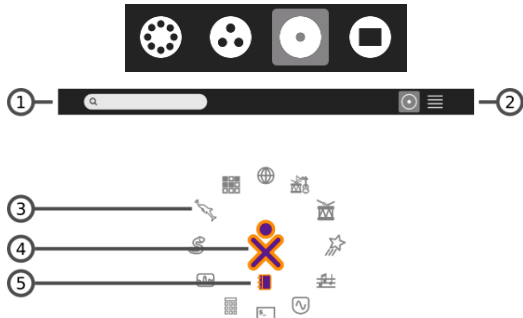
Don't leave your XO in the reach of young children or babies.

# SUGAR BASICS

Sugar has 3 main screens or **VIEWS** and an important tool called **CONTROL PANEL**.

## HOME VIEW

Use the Home View to begin new Activities. To get to the Home View, click the Home icon on the Frame.



1. Search box .
2. View modes
3. Activity icon
4. Your XO icon.
5. Active-Activity icon

## ACTIVITY VIEW

When you play with an Activity you are using the Activity View. Return to the most recently used Activity that is still running by clicking the Activity View icon at the top left of the **FRAME**.



All Activities have an Activities menu.



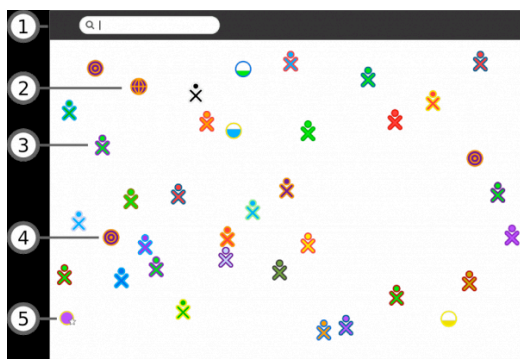
1. Activity name: the content of the Activity name field is how this specific Activity session entry appears in the Journal.
2. Share with menu: use the "Share with" pull-down menu to share an Activity with your neighbors.
3. Keep button: click the Keep button to force an Activity to save its current state in the Journal.
4. Stop button: use the Stop button to save the Activity in the Journal and close it

## NEIGHBORHOOD VIEW

You can use the Neighborhood View to connect to the Internet and to collaborate with others.



To see it, click the Neighborhood icon on the Frame. You can also use the Neighborhood button.



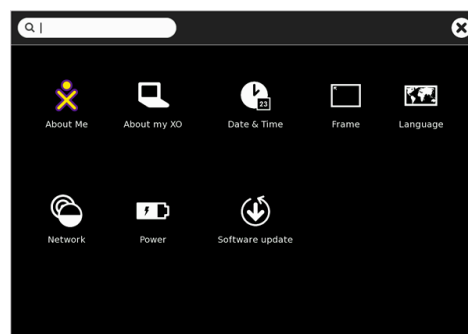
1. Search menu
2. Shared Activity
3. Other XO's around you
4. Mesh Icon
5. Wifi Access Point

## THE XO MENU

Use the hover menu that appears over the XO icon to access the Sugar Control Panel and to shutdown or restart the computer.



In the Control Panel you can change many configurations of your XO.



# HOW TO...

## HOW TO START A NEW ACTIVITY?

Use the **HOME VIEW** to begin new **ACTIVITIES**. Click on the Activity's icon to open it.

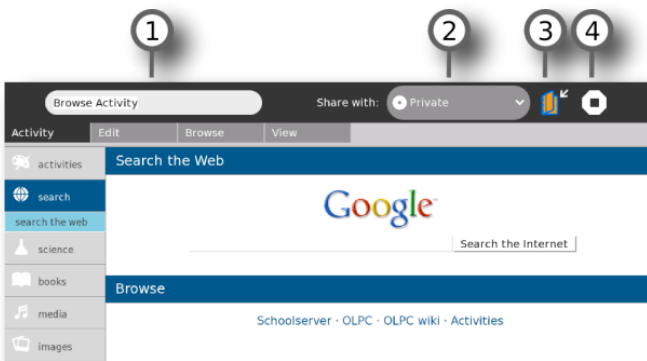


You will see a start-up view while that Activity initializes.

## HOW TO CLOSE AN ACTIVITY?

You can exit an Activity in three ways:

- Click the **STOP** icon in the Activity's tool bar on the top right corner of the frame (4)
- Press **ctrl + q** (Note: pressing **alt + escape** also works in most cases).
- Click **Stop** on the hover menu for the icon of the Activity you wish to stop.



## HOW TO SAVE YOUR WORK?

The XO was designed to children, and children usually forget to save their work. For this reason, the XO saves automatically everything you do.

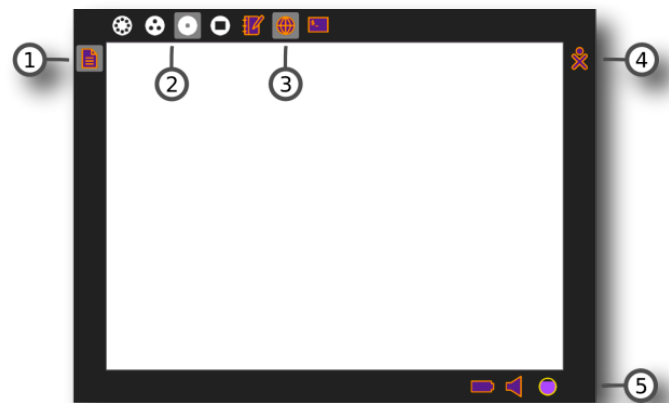
However, there are a few tips you need to know. First, is that you can name your work, so next time you need it, it is going to be easy to find. For doing that, you just need to type a name for your document in the activity name box (see n° 1 in the figure above). Simple as that.

If you want to guarantee that your document is safe, click on the **KEEP** button (n° 3 in the figure).

## HOW TO CALL THE FRAME

When the mouse reaches the borders of the screen, or when you click the frame key, the frame becomes

active and you will be able to see:



### 1. CLIPBOARD

The left-hand edge of the **FRAME** serves as a clipboard. You can drag objects such as images and text to and from the clipboard, and from and to activities.

### 2. ZOOM MENU

The **ZOOM** menu is on the upper-left edge of the Frame. Use it to move between the four Sugar views: **NEIGHBORHOOD**, **GROUP**, **HOME**, and **ACTIVITY**.

### 3. OPEN ACTIVITY LIST

The list of currently open **ACTIVITIES** appear on the top edge of the **FRAME**. The active Activity is highlighted. (The **JOURNAL** always appears here.)

Sometimes an unlabeled circle appears here --- it usually represents an additional full-screen session started by an **ACTIVITY** whose icon already appears in the top edge of the **FRAME**.

Invitations also appear on this portion of the Frame. They appear as icons in the color of the person who sent them.

### 5. SYSTEM STATUS

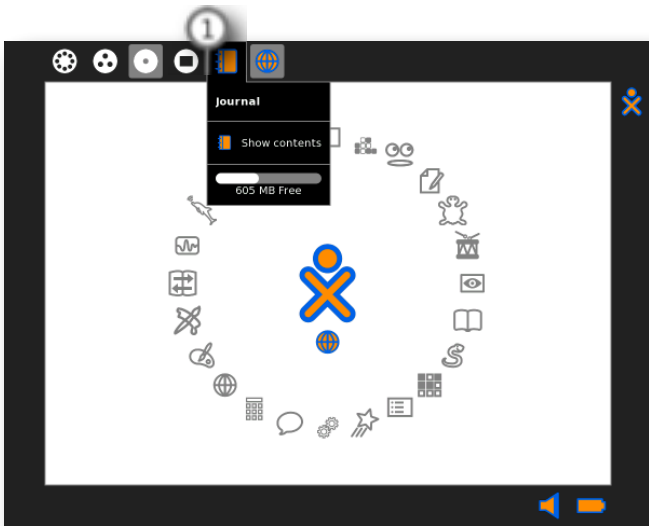
Battery, speaker, and network status appear on the lower edge of the Frame.

## HOW TO OPEN A PREVIOUS WORK?

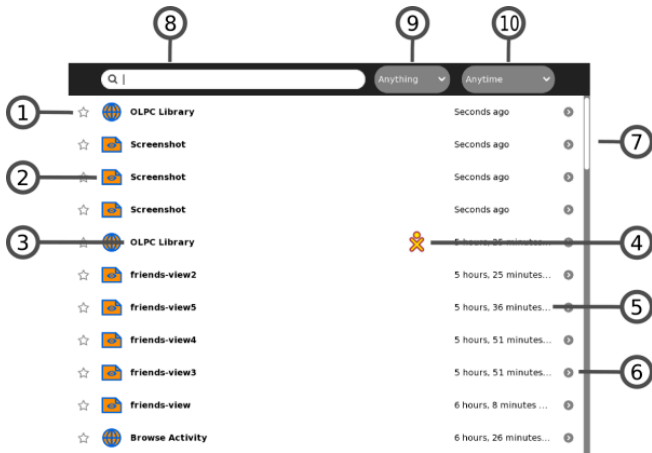
Everything you do in your XO is kept in the **JOURNAL**.

The Journal is like a diary, where all your stuff is organized in chronological order, making easy for your to recover it.

To access your Journal, you need to open your **FRAME**. The **JOURNAL** is always there, the 5<sup>th</sup> icon from left to right, that looks like a book (see n° 1 in the figure above).



Inside the **JOURNAL** you will be able to see all the documents you have created and all activities you have done.



The Journal View contains a menu and a list of journal entries:

**1. STAR**

You can mark important entries to help them stand out in the list by clicking the star icon for that entry. When you click the star icon, the star is colored in.

**2. ICON**

Each Journal entry has an icon. The color of the icon shows who created the entry. You can launch the Activity for the entry by clicking the icon.

**3. ENTRY NAME**

Each entry has a name. You can edit the name by clicking it.

**4. BUDDY ICONS**

If other participants joined you in this Activity, icons in their colors appear here.

**5. ELAPSED TIME**

The Journal displays the time since the most recent change to the entry.

**6. DETAIL VIEW BUTTON**

Click this button to see detailed information about the entry. See "Journal detail view", below.

**7. SCROLL BAR**

When there are more entries in the Journal than can fit on the screen, you can use the scroll bar to scroll through them.


**8. SEARCH BOX**

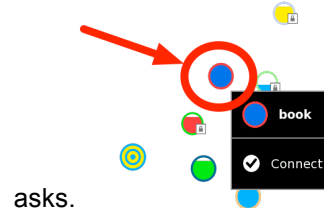
Type words in the box to search for entries that match those words.

**HOW TO ACCESS THE INTERNET**


To access the Internet, you need to go to place that has Wireless Internet or Wifi. You need to connect to the Wifi Access Point by radio in order to be able to access it.

To connect to the Internet, you go to neighborhood

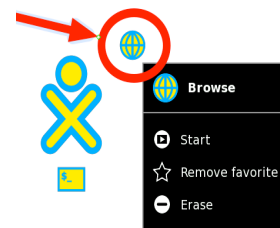
view by pressing  and check the name of the access point you want connect to. Click on the access point and type the password if it



asks.

When you are connected, 2 lines will appear around you access point, like in the image: 

After to access the websites, e-mail, etc, you need open the browse activity.



Sometimes, this Wifi Access Points are password protected. This means that you need to ask for the person that owns the Access Point what is






the password to access the Internet.

When you need to type the password, the image above will show up.

# TROUBLESHOOTING

What to do if:

<p>The mouse starts jumping?</p>	<p>a) First you can keep pressing in the same time the 4 extremes keys in the keyboard for about 30 seconds and realize them.</p>  <p>b) If it doesn't work you can press once the turn off button, wait 1 minute and press it again.</p>  <p>c) If the mouse continues jumping: shutdown the laptop, remove the battery, wait for 1 minute, insert the battery and turn on again. Or you can remove the battery and power up the laptop on external power. Once the laptop is powered on, turn on the laptop and insert the battery.</p>
<p>The mouse doesn't move and the keyboard doesn't work?</p>	<p>In this case you need restart the laptop. You can do it pressing for 30 second the button of turn on. You can also click in the same time the keys: Ctrl + ALT + erase.</p>
<p>The laptop doesn't turn on?</p>	<p>First, verify if it is connecting to a power (maybe the battery is not charged). Second, if it is connected to a power, take out the battery and try turn on again without it. Once the laptop is powered on, turn on the laptop and insert the battery.</p>
<p>The laptop doesn't turn off?</p>	<p>In this case you need force the laptop to shutdown in the way that it is not so recommended. You can do it by pressing for 30 second the button of turn on/off. To make sure that the laptop is off, verify if all the light are off.</p>
<p>The battery doesn't charge?</p>	<p>If your battery doesn't charge, remove the battery and power up the laptop on external power. Once the laptop is powered on, insert the battery. It will now charge, and the charging light should be on (the orange on)</p>
<p>The sound is not working?</p>	<p>First you can try press the volume keys on the keyboard. </p> <p>If it doesn't work you need ask help for a technical person to bring the USB Key and copy a solution for it.</p>

The battery light turns read?  
Yellow?  
Orange?

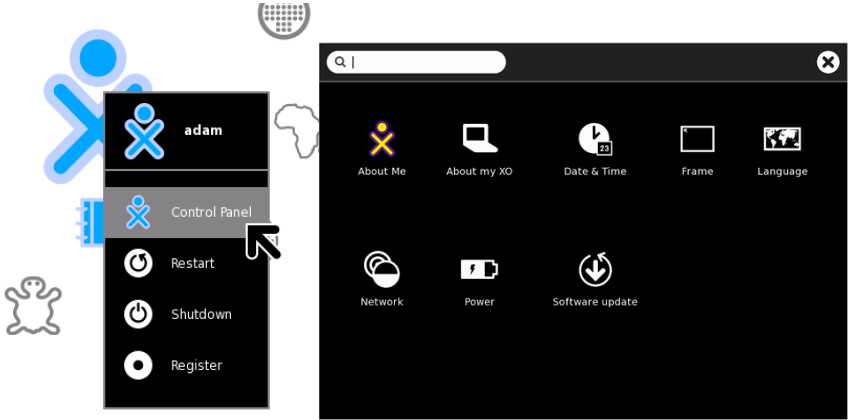
Battery light RED is a sign that you need charge you battery as soon you can or shutdown your laptop. If you don't do it the laptop will turn off by itself and it will damage the battery.

Battery light Yellow: It means that your battery is full of charge. You can use the laptop without connect in the power.

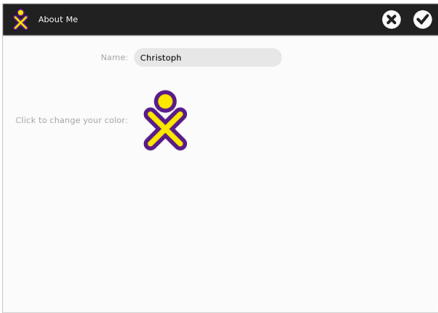
Battery light Orange: it means that the laptop is being charged or that there is still battery for you work without connect on the power.

You want to change your name in the laptop?

To change the laptop name, put the pointer of the mouse over the XO icon in the center of the Home View and a menu appears. Select Control Panel. After: About me




Erase the name and type your name. By clicking over the XO you can change the color. When finish, click on V icon.



If you make changes on this panel, you must restart Sugar (ctrl+alt+erase) for them to take effect. Caution: You may lose any work you have open.

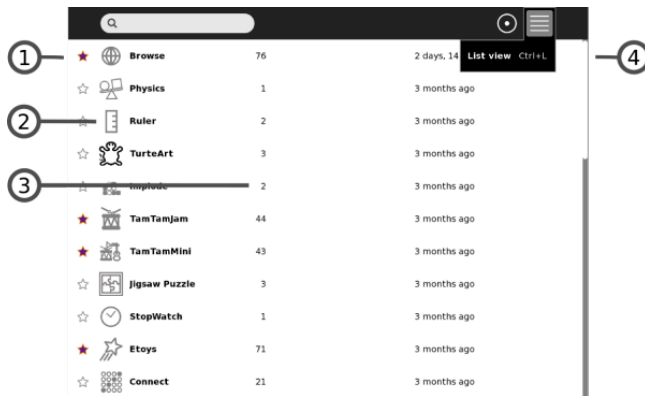
You want to change the language?

To change the language, put the pointer of mouse over the XO icon in the center of the Home View and a menu appears. Select Control Panel. After: Language. Choose the language and click . If you make changes on this panel, you must restart Sugar (ctrl+alt+erase) for them to take effect. Caution: You may lose any work you have open.



There are many possibilities: you could have removed the activity without intention. To have the activity, you need a USB Key with this activity or download from the Internet to install it again. In the circle view only the favorites activities appear. To check it click on List view. The favorites activities, which appear in Ring mode or Freeform mode, have a colored stars. To add or remove more activities for the favorites, click on star to color or clear it.

The activity is not appearing in the home view?



Press the rotate key to orient the display.

You want turn the screen

