

GIVE ALL PATIENTS THE SAME LEVEL OF CONTROL



"After a devastating injury or illness, many patients lose their sense of independence and control. Activities once performed effortlessly, may only be possible with the assistance of others. This device helps individuals start to see the things they can control — it gives them back a sense of independence."

Judith M. Burnfield, PhD, PT
Madonna Rehabilitation Hospitals
Director, Institute for Rehabilitation
Science and Engineering



While most patients are capable of calling the nurse, controlling the television, and adjusting lighting, patients with limited dexterity are often dependent on clinical staff to assist with almost all functions.

Working closely with a team at Madonna Rehabilitation Hospitals we designed the AC20 Assistive Control Adaptor. It gives patients with limited hand control the ability to use sip-and-puff devices, button switches, or other types of sensors to call the nurse, fully control the TV, adjust lighting, and even open shades and drapes. Each device can be configured to suit each patient's ability using the existing clinician-recommended switch, giving the patient the ability to navigate through menus and select options.

With the AC20, what previously required a visit from hospital staff can now be performed independently by the patient.

THE AC20 SYSTEM

The system has two main components — the Display Module and the Base Module. The Display Module mounts within view of the patient and provides access to nurse call, TV controls, and room controls*. The Base Module mounts on the headwall or IV pole and provides power to the display module and connects to the nurse call system.



CONNECTIONS

The AC20 system connects easily. Just connect the Display Module and a nurse call device to the Base Module, and connect the Base Module to and AC outlet and the nurse call patient station and it's ready to use.



NURSE CALL DEVICE FLEXIBILITY

The AC20 gives you the flexibility to choose the right input device for each patient, including any that Curbell offers. For patients with limited manual dexterity, such as quadriplegics and immobilized patients, we recommend the Zephyr Breath-Activated Call Device (see page 8).

The Base Module can accept either a 1/4" or 1/8" plug for its two inputs. A switch plugged into the SELECT jack is used to select whatever menu item is currently highlighted by the Auto Scroll menu.

Plugging a second switch into the ADVANCE jack turns off the Auto Scroll function and allows the patient to step through each onscreen menu.















AC20 GOES WHERE YOU NEED IT



The mounting clamp can be adjusted to fit onto most side rails. The gooseneck allows the display module to be positioned where it's most convenient for the patient.



The mounting clamp and gooseneck can easily be moved to a an in-room wheelchair (note that this option only works within the patient's room, as the AC20 needs to be connected to the nurse call system).



The entire system can be mounted to an IV pole for easy portability from room to room. This provides the most flexibility when the patients who need the AC20 aren't always asigned to the same rooms. Just roll the system into the new room, plug it in, and it's ready to use.

PERMANENT BASE MODULE MOUNTING





The Base Module can be mounted permanently to a wall or headwall with the mounting plate.

PORTABLE BASE MODULE MOUNTING





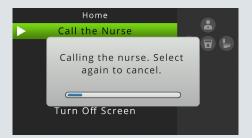
This moutning plate allows the Base Module to be mounted onto the gooseneck, which can then be attached to an IV pole.

USING THE AC20 IS EASY

The AC20's display is bright and easy to read and can be set to one of three languages. The adjustable Auto Scroll function moves the highlight bar through each menu. When the desired menu item is highlighted, the patient uses their nurse call device to make the selection. Adding a second nurse call device (or a dual-function switch) allows the patient to cycle through the menus at their own pace.



Shown here are screens that the patient will see when calling the nurse, and controlling the television and lights.



For safety and security, the "Call the Nurse" option is present on every screen. Once the call is initiated, the patient has the option to cancel the request if selected in error.



The system can be configured to allow entry of a specific channel, saving the patient from having to cycle through all available channels to get to the one they want.



If the lights are connected to the nurse call system, the patient can turn lights on and off.

Wesley's Story









The AC20 gives patients access to all the advanced functions of your nurse call system.

For patients who have suffered a complete spinal cord injury, like Wesley, their first glimpse of independence often occurs once they arrive to a specialized rehabilitation facility like Madonna Rehabilitation Hospitals in Nebraska. A quadriplegic, Wesley was completely dependent upon others to manage simple tasks like turning on the TV until he was introduced to Curbell's AC20 Assistive Control Adaptor.

"When I was in acute care, I wasn't able to move or speak. The AC20 would have given me a way to reach the outside world and communicate what my needs were. I think that would have been very beneficial."

Now, using a sip/puff mechanism to navigate the AC20, Wesley can control his hospital room TV and lights independently, and is also able to call the nurse when he needs assistance. He says the device is easy to use and provides him with added confidence in his journey to recovery.

CUSTOMIZE AC20 FOR EACH PATIENT

The default settings will work with most patients, but there are numerous options that allow the device to be easily customized for each patient. Staff can enter the Privileged Settings screen by pressing the Advance and Select buttons on the Base Module simultaneously.



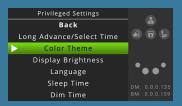
Settings like Auto Scroll Behavior set the device to operate in a way that's easiest for the patient, depending on the patient's abilities.



The TV menus can be set to offer just basic controls (channel, volume, and power), or additional features like numeric channel entry, mute, closed captions, and last channel.



The AC20 can be set to display its menus in English, Spanish, or French.



Settings like Color Theme, Display Brightness, and Sleep Time let you further customize the device for each patient.

Donna's Story



The AC20 lets you use virtually any type of input devices, from the "large red button" that Donna uses to our Zephyr breath-controlled call device.

After suffering a complete spinal cord injury, Donna is learning to navigate life with limited mobility. While rehabilitating at Madonna Rehabilitation Hospitals in Lincoln, Nebraska, Donna was exposed to the AC20 Assistive Control Adapter, a device that gave her a first taste at independence since her injury.

"I don't have to yell for the nurse just to have my TV channel changed and don't have to wait for somebody to turn on or off the lights in my room. With the AC20, I have control of that."

Because her injury has affected movement in her hands, Donna navigates the AC20 by using her wrist or elbow to push a large red button. The device's programming allows her to control her hospital room environment and to communicate her needs directly and succinctly with her nurses.

"If I need the nurse and want something to drink, I like the option on the AC20 that allows me to tell the nurse that I need a drink, need to go to the bathroom, or whatever it is I need."

Donna said the only thing she wished about the AC20 is that she would have had access to it sooner. "I didn't have any strength at all in my hands prior to coming to Madonna," she said. "So I could have used my elbow to call the nurse, change channels or turn on the lights rather than have to yell for a nurse when I needed help in my previous hospital. The AC20 absolutely would have been beneficial to use there."

ZEPHYR HELPS CONTROL INFECTIONS AND COSTS

For patients with limited manual dexterity, such quadriplegics and immobilized patients, the Zephyr Breath-Activated Call Device is the perfect accessory for the AC20.

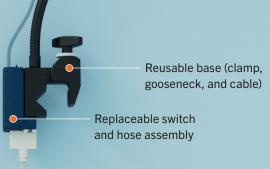
Other breath devices are intended for single-patient use, and are to be discarded in whole, as contaminants can linger in the tubes and switch mechanisms. The Zephyr Breath-Activated Call Device is designed for maximum infection control while also helping to control costs. It's comprised of two parts:

The reusable base (gooseneck, clamp, and cables) is easily cleaned between patients.

The disposable switch assembly is changed between patients. This eliminates all parts that can come in contact with a patient's breath, and contaminants that would be potentially passed to other patients.



Just like the AC20, Zephyr's adjustable clamp fits the bed side rail or headboard, IV pole, or wheelchair, and the gooseneck can be adjusted to almost any position.









Slide and click a new switch and hose assembly into place between patients

AVAILABLE CONFIGURATIONS



Switch closure occurs when sipping (pulling air) from the tube.



Switch closure occurs when blowing air into the tube.



Two switch closures activated — one for each of the actions.

Curbell Medical grew out of the company's plastics business in 1962 when we began to fabricate parts for General Electric's wired remote control units for its hospital televisions, commonly known as "pillow speakers."

Today, Curbell Medical is the world's largest manufacturer of signaling devices and related accessories for hospitals and nursing homes.





