

# SOLUTIONS:

## Assistive Technology for People with Hidden Disabilities

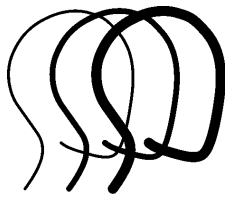


A project of the  
Iowa Department  
of Public Health  
and the Brain  
Injury Association  
of Iowa

Produced with  
assistance from  
the Iowa Program  
for Assistive  
Technology and  
the Center for  
Disabilities and  
Development



<http://www.tbitac.org>



The Brain Injury  
Association  
Of Iowa

<http://biaia.org>



Iowa Department of Public Health

*Promoting and protecting the health of Iowans*

<http://www.idph.state.ia.us>



Iowa's  
Advisory  
Council  
On Brain  
Injuries

<http://www.idph.state.ia.us/sa/hprom/brain.htm>

The printing of this booklet was funded through a grant from the Department of Health and Human Services (DHHS) Health Resources and Services Administration, Maternal Child and Health Bureau. Its creation is part of the Iowa Department of Public Health's "Meeting the Needs of Iowans with Traumatic Brain Injury" grant. The grant is operated in cooperation with the Advisory Council on Brain Injuries and the Iowa Brain Injury Resource Network of the Brain Injury Association of Iowa. It does not necessarily reflect the views of DHHS.

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# Memory

*I have walked into a smoky kitchen many times because I left the room with food still on the stove.*

*Margaret has stopped coming to meetings and social outings because she doesn't drive. Her husband, Oscar, doesn't remember when and where to pick her up for the ride home.*

*Mark can go weeks without his medicine because he needs reminders to take it.*

*My mother-in-law lives with us and she forgets to turn off the water. One day I came home to water running out of the sink, through the ceiling and soaking the living room furniture.*

*Frank loses his glasses, the TV remote control, and his keys all the time. It's hard to convince him they weren't stolen.*

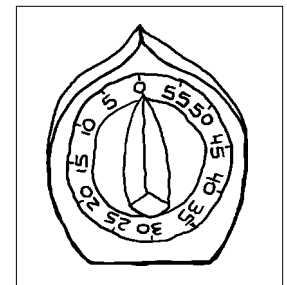


There are many adapted devices for people who have memory problems. These devices help people to remain at home and in the community. Some are specialty items while others are available through local stores.

## Kitchen Devices

You can help avoid forgetting tasks. Use a microwave or toaster oven that shuts off on its own. Many stores carry products that shut-off, such as coffee makers and irons. There are a variety of devices that are available to add alarms and shut off features to standard products.

You can also find simple timers or watches that can be set to remind you that the stove is on or the cake is done. They can also give reminders to lock the door, to take medicine, or to call a loved one.



*cooking timer*

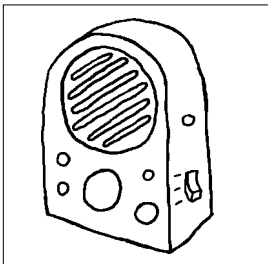
## Reminder Aids

Watches with alarms or devices with timers can remind a person at pre-set times. They gently remind you to do a specific thing. They make a sound or vibrate and can be set for any time. They can remind you to tighten muscles, breath deeply, or finish a physical or mental exercise.

A simple recorder can also help remind with a message. They can remind someone to meet you at the library at noon. They can also be used to help remember phone numbers and grocery lists. Some memo recorders have clocks and alarms and can give specific reminders, some at the same times each day of the week. Some pagers have voice and text messages. They can be used to remind someone of appointments and next steps.

## **Bathroom Aids**

Forgetting to turn off the water can result in damage to homes and offices. Devices to control water in various ways can prevent problems. Electric-eye faucets turn the water on when they sense a person's hands in the sink and turn the water off when the hands are removed. Another option, is a stick-like attachment that hooks on a sink faucet. The water is left on all the time, but does not run until the stick is touched gently. When you stop touching the stick, the water shuts off.



*message center*

## **Locating Devices**

There are devices made to help us find items we have lost. Sometimes you can use devices that were made for other uses, like a wireless door bell. Put the receiver on something that gets lost all the time. When it turns up missing, push the door bell and the lost item will chime. Some key chains now have alarms to signal where they are. Attach one of these key chains to something you lose all the time, like the TV remote, a portable phone, or your glasses. When you lose the item, just whistle or clap and the alarm will beep. Many wireless remotes and telephones now come with locator buttons built in.

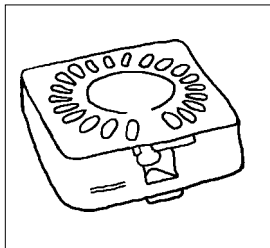
## **Medication Devices**

There are many devices to help people take medicine. Everyone has seen the pill holders with dividers for daily and weekly doses. Now there are some that open like a book, with 28 easy-to-load bins inside to hold enough pills for four doses a day for a week, or one dose a day for a month. Just push a button to get the correct pills.

Pill alarms sound an alarm when medicine needs to be taken. Pill alarms can come small enough to fit in your pocket. Some are part of a watch. There are some that even replace the cap to your prescription bottle.

Some re-set to repeat the same reminder, have built-in water, or have lights to tell you which compartment to open.

There are also automatic medicine dispensers. These can organize a week's supply of pills and vitamins in a refillable plastic tray. The tray is locked into a machine that delivers the medicine into a tray. An alarm tells you when you are to take the medicine and will buzz until the pills are removed and the tray is replaced. There are some automatic systems that will alert someone if your medicine has not been taken. This has the added benefit of warning others to a more serious medical condition or fall.



*medication devices*

### **Things you can do to make life easier...**

- Use pictures, charts, or symbols to help clarify directions and explanations
- Teach tasks in "real life" situations, i.e., teaching cooking in the person's own kitchen
- Place ash trays in sand-filled plates or cans to reduce the risk of fires
- Label photos, perhaps putting them in wallet folders, as reminders for those who do not recall familiar people and places
- Create lists or pictures of the contents of cupboards and drawers
- Install glass doors so cupboard contents can be seen at a glance
- Rely on recipes rather than memory
- Enlarge the print of existing recipes, write out family favorites, and highlight cookbook favorites
- Attach keys to a bungee cord hooked to a wrist or belt loop

## Attention, Planning & Task Completion



*Esther has always been known as a great cook and now gets so confused that she forgets ingredients and adds things that don't belong. The results are embarrassing.*

*Everybody in our community knows Pete and knows he visits the local businesses each day. More and more often, however, we notice him wandering around, confused about where to go. If we tell him the "next" place to visit, he goes there happily. He seems to need a "schedule" of some sort.*

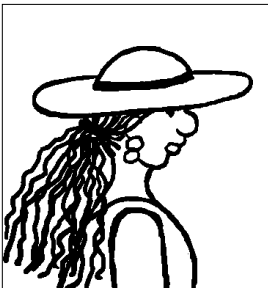


*Amy is a good student but she does not complete assignments or turn assignments in on time. She also forgets meetings, even those she really wants to attend.*

*Cal is a very good employee. He is supposed to keep his own work schedule, organize and prioritize his tasks. Because all of this is very difficult for him, he doesn't get everything done.*

*Jerry has trouble remembering since his car accident. This includes steps in his job like clean-up, making coffee, and stocking shelves.*

*My son's brain does not tell him when he is full at mealtime. Without supervision, he gorges himself with food during lunch.*



*A student who works at a local café misses her bus home because she loses track of time. She starts her clean-up too late. Phone calls to remind her or work support visits embarrass her. They also irritate her employer and take up staff time.*

*Frank works in an office and gets distracted by the activity around him. He starts work tasks, but doesn't finish them or does them poorly because he can't stay focused on tasks.*

*Andy is an active and "busy" child. At school, he needs many reminders to stay in his seat and finish his work.*

Adapted devices are available for people who have problems with attention, planning, and finishing tasks. There are tools to help you when you get distracted, to help you remember, to help you be more organized, and to help you schedule your time.

## Aids to Reduce Distraction

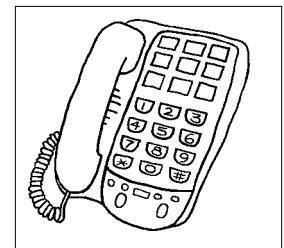
Small changes can help reduce distractions. Equipment with too many controls or functions may be confusing for some people. Placing shields or color codes on some of the unneeded controls are helpful. Putting partitions around a person's work area can reduce distractions.

Office noise can be reduced by turning equipment off when it is not in use or by closing the door to those areas. Earphones provide a person with a masking noise to help block out sound distractions. FM systems or auditory feedback devices (with earphones) improve focus by enhancing a speaker's voice so that it is more obvious.

## Phones

Phones with speed dial can reduce the need to remember numbers. Some phones, have large speed dial buttons that have spaces for symbols or photos to represent a number. This feature is useful for people who cannot read well or who have memory problems.

TTYs are small devices with keyboards and visual displays. Some models also have printers. TTYs were designed for people with hearing and speech disabilities, but they have been used by other people to keep track of conversations. TTYs help you remember a conversation. They also have delayed reaction time by giving you a printed display of the conversation. You can print a copy of the conversation to review later or as often as necessary.



*TTY or large button phone*

## Task Organizers

A pager can be used by a supervisor or teacher to remind a person to pay attention to what they are doing, to move on to the next task, or to look up at the speaker. People who have problems remembering each step can also use audio tapes. The job can be broken down into steps and recorded. A person can use this information to guide them through work and repeat it until the task is done. Tape recorders can be a means to repeat, reinforce, review, and remember. There are also large button switches that can record and can be used for individual tasks or to remind a person of each step of the job. Some devices can give the next step visually, as well as with recorded voice.

The Palm Pilot and other similar hand-held devices have a touch screen that helps a person to input, save, and retrieve notes. They can also be used to store phone numbers, dates, and daily reminders. They can also have a calendar that displays the entire month. You can use the cursor to move from day to day or month to month.

There are more complex systems such as computers/software with portable pagers. They can help a person with short-term memory and keep them from being distracted. It helps create good self-management habits by prompting the person at the moment something needs to be done. The system works by relaying reminders from a computer to a commercial paging carrier. That in turn relays the message to the person in school, at work, or in the community. These devices can reduce the need for job coaches by giving reminders, as well as provide direction and guidance. An example would be to send a "Time to clean up" message and 10 minutes later send a message to "Go to the bus." This works well for someone who can't remember all the steps in their tasks at work. As a result, this worker no longer misses the bus and feels more responsible.



*pager*

Some people need something to help them remember appointments or activities. There are devices that consist of a computer with preprogrammed messages, times, and a beeper that signals the message. The beeper provides the reminder to go to an appointment or to do a task at the right time. This allows a person to cue themselves at any time in any place. The person does not have to worry about learning a complicated system. Prompts are sent to their pagers. The person simply reads or listens to the prompt. The times and prompts can be once or repeating, it all depends on what the person needs. This device could be programmed to remind a student to attend basketball practice after school or to remember homework before leaving school. This allows the student to be active and to finish homework on time with more independence.

Outlining and mapping software programs are available to help a person organize their tasks. They allow the user to diagram tasks or ideas and then make connections between them. These 'idea maps' can then be put into a schedule or outline and printed. This gives a reference to help a person complete tasks, as well as giving them a way to participate in the planning.

## Time Management Aids

Many people are able to use personal calendars or daily planners to manage time and complete tasks. Other, simple solutions are portable timers, alarm clocks, and watches with alarms. All of these can be set to ring when a task needs to begin, finish, or change.

Special devices have been designed to help train for attention. There are special seat trainers that allow a person to simply sit on a pressure sensitive switch that is attached to a feedback box. When the individual moves off the seat, a light on the box turns "on" and an alarm sounds. This device can also be used as a bed alarm that sounds if a person leaves the bed when it is unsafe for them to do so. Some have the added ability to turn on a reward.

Computers can help with attention, planning, and finishing tasks. Daily planner software can help organize daily and monthly activities and you can print copies. Computer tutorials give training that can be repeated many times. People with hidden disabilities need software that is multi-sensory, can be personalized, that reinforces, and that can motivate. It needs to provide a predictable routine.

### ***Things you can do to make life easier...***

- Post an outline of daily job tasks on a single sheet of paper, perhaps using symbols, pictures, or maps rather than printed words
- Arrange materials for a task in the order in which they will be used, such as setting out clothes for the day in the order in which they need to be put on (underclothes, shirt, pants, socks, shoes)
- Establish clear guidelines that vary little from day to day
- Simplify and reduce the number of choices, eliminating the possibility of "wrong" choices
- Reduce the actual number of tasks, by limiting the number of steps or by breaking them into smaller and more clearly defined steps
- Reduce the environmental clutter

## Confusion

*Cathy becomes confused and loses sense of time and place. She will call a friend or family member to get that information. This can be time consuming, costing her money with large phone bills.*



*Dad tells us amazing stories of being chased, poisoned, and even meeting aliens all in one day. I know he has not left the house and that we are his only visitors. I realized he was recounting what he had seen on TV, as if it were his life.*

*My daughter will not get into the bathtub. She says it is too deep and she will not be able to get out.*



*Steve could not find his way back inside when he went in the yard to work in his garden. He would just walk around and around the house until he became so tired he had to sit down and rest.*

*David has a hard time getting into the cafeteria. He thinks the dark colored tiles on the floor are holes he will step into.*

*Betty won't deliver the mail to one part of the building. She insists that every time she walked down that hallway someone was following her. We found out that was seeing her shadow. We made the hallway brighter and the 'someone' disappeared.*

*Aunt Gertie forgets to take her medicine or takes it too many times. This made her unsteady on her feet and so confused that we thought she could no longer live alone.*

*Stan can do the payroll at work, but he can't remember WHEN to do it. When finally reminded, it's too late for him to complete the job on time.*

*I cannot always remember the names of family and friends. So, I've stopped getting together with them, because I feel sad and embarrassed when that happens.*

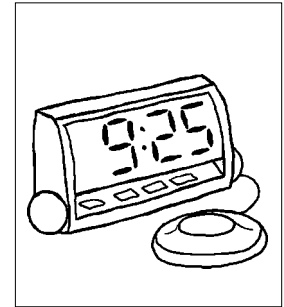
There are adapted devices to help a person who gets disoriented, misinterprets things, or gets confused. They can help with time and place and keep you from mixing up real life with fantasy. This lets a person continue with the activities they enjoy, as well as those that they need to live.

## Reminder Aids

We all use devices to keep us on track and on time. Reminder aids can help with judgment and reasoning. It makes sense to use devices when it is hard to recognize or remember the correct day of the week or time of the day. Sometimes forgetting can be the cause of inappropriate actions.

Hanging calendars or clocks, or wearing a watch are easy first steps. Write down activities to be remembered on the right day, then set watches and alarm clocks to remind you. Examples of this could be: when it's time to watch a TV program, take a pill, or meet a friend. If it's hard to read a clock with hands, get one with digital numbers. If that doesn't work, use a talking clock or talking calendar. They will tell you the time of day and date aloud with the push of a button. They can be used as many times as a person feels they need the information. For those needing reminders while on the go, talking watches with date and time, are also available.

Some devices use special phones and phone services. They allow a person to program four daily reminders. A tone sounds and the reminder key flashes. This can remind a person to take medication, go to an appointment, to exercise, or feed the cat. These phones can also have emergency response buttons, speakerphones, automatic alert dialing, and memory dialing. These help with thinking skills while allowing a person to be safe and independent.



*digital alarm clock*



*talking watch*

## Bathroom Aids

There are a variety of ways to alter the bathroom to reduce confusion and fear. Carpet placed on the floor, towels on bars or racks and curtains on the windows absorb splashing sounds. If that is not enough try cascading faucets that don't splash, the water slides into the tub or sink. Define the tub by placing light colored mats in dark tubs, and dark colored mats in light tubs. Install grab bars to hold when standing, sitting or climbing in and out of the tub or on and off the toilet. Start in a dry tub and let the water fill while sitting, or use a bathtub seat and hand-held showerhead. This allows the person control over the water. If the bathroom is too much, try a bath in bed with an inflatable bathtub. The tub to be placed under a person lying in bed and then inflated around them. Hoses run from the tub to the bathroom for water and to drain. Garden hoses can be used if the bathroom is far away.

### **Things you can do to make life less confusing**

- Paint door trims along hallways in contrasting colors to make identification easier; bathroom trim blue, bedroom trim yellow, etc.
- Place a poster with a seasonal scene on the back of the front door to serve as a reminder of what type of clothing might be necessary before leaving

- Change alternating dark tiles with water-proof paint or contact paper that may be removed later without damaging the floor
- When mirrors present difficulties, remove them, place something in front of them, turn them around, or cover them with contact paper or water-based tempera paint
- Put a sign on the front door "Jean's House" or use items at the doorway that attract the individual (bright red geraniums in pots, gold lions) to help signal home
- Keep wall paper patterns, rug patterns and color schemes conventional; avoid designs with flowers or figures that an individual may want to pick or talk to
- Increase lighting in shadowed areas such as closets or showers
- Trim outside bushes and light walkways to eliminate places where someone "could be hiding"
- Create maps to use in and outside the home
- Use clear shower curtains
- Place benches or chairs next to outside doorways

## Environmental Aids

Lighting can make a room clear and friendly. Increase lighting to remove shadows. Leave lights on in dark areas or use nightlights, and have touch lamps to get light quickly. Install touch light control. They fit between the plug and the outlet. A touch lamp is turned on and off by touching any metal part of the lamp or the cord. Some touch switches have a remote pad that you can put across the room to use. Install motion sensor night lights, motion sensor wall switches, or motion sensor lamp adapters. These automatically turn on lights and lamps based on movement. There are also voice operated light switches that turn on the light by just speaking.

TV can cause misunderstanding. Sometimes a black and white picture can be better than color. Instead of buying a black and white TV just change the color menu all the way down on a standard colored TV. TV and radio voices can also be confusing. Use headphones that plug into the TV or radio. Headphones or personal listening devices allow you to listen privately. Another solution is to use the closed captioning feature. This is a built in feature of all TVs manufactured after 1993. It provides text where there is speech.

## Locating Aids

There are many ways to help a person who is disoriented and lost. Put photos on bedroom doors. Have the person wear a medical alert bracelet. This gives a contact number to call to let them know where the person lives or where they can come to pick them up. Teach the person to use in-store Help Phones or mail information to get the information they need.

There are electronic devices you can program with your voice for phone numbers, directions, reaffirming messages, or next steps. This helps a person maintain independence. Global Positioning Systems (GPS) are available and can track an individual's location anywhere on the planet. These hand-held devices receive signals from a satellite. Some GPS provide tracking while others give specific information on a person's position. Some have wireless e-mail. These devices help keep an individual on track and provide a means to locate them should they get lost.

## Mood

*JoAnn has a terrible time sleeping. She complains of waking up 'wired' in the middle of the night, or not being able to sleep at all.*

*Tom can't face getting out of bed in the morning. He feels like he can't do anything well. He feels burned out and useless, which makes him feel hopeless.*

*Kelly is irritable and angry. Some of her reactions to everyday things are frightening and she doesn't find humor in anything. Friends shy away from her.*

*Dad used to love to go out to eat. Now it makes him sad, because he can't remember what is on the menu or what he likes to eat.*



There are adapted devices available that can soothe, uplift, and calm. These devices fall into the following categories: comforting, light regulating, and sleep aids.

### Comforting Aids

Music can be great for calming and focus. There is a variety of music to try. Music to calm captures sounds from nature such as rain, breezes, and waterfalls. Period music brings back happy thoughts and memories of a person's life, maybe childhood. You can also try religious or gospel music; patriotic music or sing-a-long music. You can buy music just about anywhere, which makes it an easy tool to use.

You can also get portable devices that offer soothing sounds. Some are compact, run on batteries and are a radio. The soothing sounds you can choose are usually sounds from nature, such as waves, streams, crickets, or frogs. Most of these devices also provide a white noise which masks all other sound. You can carry them in your pocket and use them anywhere. You can also get table-top models. Look for these devices as sleep aids in home gadget catalogs.

Sometimes just talking with another person helps. When you can't talk face-to-face, you can use an intercom. A simple version of an intercom is a baby monitor that works one way. You can also get wireless intercom systems at electronics stores.

### **Things you can do to make life easier...**

- Create bright and cheerful environments, use pleasant colors, paintings, and pictures of happy subjects
- Use full spectrum or incandescent light bulbs that emit warmer colors
- Open curtains and raise shades to bring in natural light
- Provide activities and choices: "an active mind is a healthy mind"
- Exercise, make it part of every day.
- Purchase or adopt a pet. They make great diversions and can increase a person's sense of worth through the responsibility of feeding and routine care giving
- Put away valuable and breakable objects. Replace fragile lamps with non-breakable ones. Soften sharp, hard edges of counters and tables
- Create a special place or room that is safe and comfortable
- Create and maintain a regular schedule, which includes proper sleep, diet and exercise

There are headphones that cancel noise for people who have problems while they are out and about. These headphones reduce background noise by using two built-in microphones, which pick up sound and feed it to a circuit that analyzes the sound wave pattern and then creates an exact opposite sound wave, thereby canceling both sounds. The noise cancellation can be adjusted by the user to fit their need. The headphones may be used alone or work as headphones to a CD player or personal stereo.

Vibration and massage can also help a person relax. There are many massage aids, from simple vibrators to massage chairs.

### **Light Regulating Aids**

For those who need a gradual wake-up, there are devices that will do this. Some work with light. They slowly start to glow a half hour before your actual wake-up time. They slowly illuminate the room and become brighter and brighter until it is time to get out of bed. They also have a sundown mode that will slowly lower the light from full intensity to darkness. There are some devices that do the same thing with sound.

If you are sensitive to lack of light in the winter you might benefit from an artificial sun lamp. They can be placed on a table or dresser for easy access. You can get the helpful sun while doing other things like playing cards, reading, or talking to friends.

### **Sleep Aids**

There is nothing more underrated than a good night's sleep. When falling asleep or staying asleep is difficult, try some of these sleep aids. There are devices that block out annoying sounds as a result of traffic or clocks. They can help a person relax and fall asleep by producing a gentle whooshing sound. The sound tone and volume is adjustable and the device plugs into a standard wall outlet. You can also get models with different sound options.

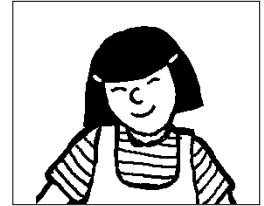
## Companionship & Socialization

*Carol likes to talk with her family and friends. But, she doesn't like to make phone calls because she gets numbers in the wrong order and gets embarrassed when she gets the wrong person again and again.*

*Michael doesn't have any real friends. He sits and plays the computer alone when everyone else is playing.*

*Sara has trouble with her social skills with other kids.*

*Mr. Johnson finds it hard to leave his house and to talk to people. He can't even buy groceries or go to the doctor.*



There are adapted devices that can help with relationships and increase a person's connection to others. These devices help with the phone, by providing comfort and reinforcement, and helping you interact.

### Phones & Pagers

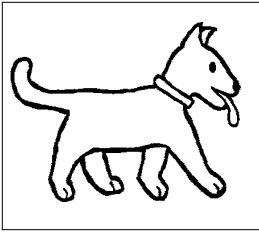
Adapted devices can help you feel more connected and safe. They can be low or high tech. Help with the phone by using speed dial numbers or picture pads. This can make it easier to contact others, helping you feel less isolated.

Portable intercoms can help you stay connected to family in the house. There are a variety of two-way, portable radios that can help you talk to another person. They range from 2-miles up to 100-miles. These small devices can help you keep in touch with family or friends while out shopping, at a ball game, or at a fair.

Cell phones and pagers are available for monthly fees. Cell phones help you connect right away while a pager sends a message that someone has to respond to.

### Comforting Aids

A person can feel better or comforted simply by holding something, like a pillow, a doll, a favorite blanket, or something more personal. Pets can play a very big role in making someone feel better. They entertain,



soothe, and comfort us. Pets are used in places like hospitals, rehab centers, and nursing homes, even on the job. When a pet is not an option, a doll or stuffed toy may provide a substitute for some people.

## Reinforcing Aids

Sometimes words of encouragement can help. Try a portable tape recorder with a message like, "You're doing fine." All you have to do is play the message to feel better. Carry a walkie-talkie to stay in touch with someone at home. They can give you encouragement, talk you through something stressful, or help solve a problem.

### ***Things to do to make your life easier...***

- Take a class that fosters an interest or a hobby
- Become a fan and follower of a local sports team, high school or college
- Join others to play cards, bingo, or just reminisce
- Volunteer to work for an animal shelter
- Invite wildlife to your environment by putting up bird feeders and squirrel feeders
- Write letters to a friend, relative, or pen pal
- Join a club, attend meetings, or serve on committees
- Develop hobbies and activities to do on your own...jigsaw puzzles, crossword puzzles, card games, gardening, crafts, collecting, or bird watching

## Aids to Encourage Interaction

Sometimes a person needs help to be part of social outings or job training. Help could be as simple as a ride to and from the activity. Help could be advice from a supervisor on how to talk, interact, and work with others. This will help a person to have successful work experiences and in creating friends.

Computers can help people interact with each other when they normally have a hard time talking with others. Use it as a tool to help with communication. Use software like games that motivate and encourage taking turns. The software should give choices and control with each activity. It helps if the software has speech and sound, as well as cool graphics.

A computer lets you "surf" the Internet. You can find groups or other people who have similar hobbies or issues. Sometimes it's easier to talk about things over the computer than face-to-face. E-mail can also help people who need frequent contacts. You can answer whenever you have the time and you don't tie up the phone.

## Safety & Security

*I constantly leave cigarettes burning all over the house. I'm afraid I'll burn the house down one of these days.*

*My son likes water and wants to touch it or be near it. We're worried he may fall into our pool.*

*Dad has poor balance. When he is walking he holds onto the backs of chairs, the edges of tables, and other unstable things.*

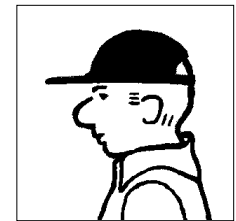
*I don't move fast and, when the water gets too hot or too cold, I suffer the consequences.*

*I think my neighbor should stay in her own home. All she needs is a way to call someone in an emergency.*

*Our Jo eats anything. She will eat soap, lotion, and harmful bathroom products that look and smell good!*

*I shake, so using some of my tools is dangerous.*

*I leave my door unlocked because it's too hard to find and use the right key.*



Safety and security is important. Adapted devices can help with many issues like poor balance, shaking, and blurred eye sight. Many devices help stop accidents and reduce the consequences when accidents do occur.

### Fire & Smoke Alarms

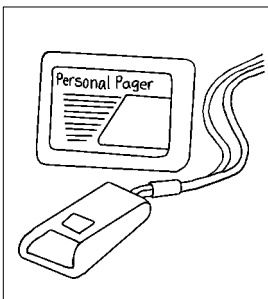
Carbon monoxide detectors and smoke alarms are good to have in every home. Some of them have flashing lights or bed shakers to go along with their beeping alarms. Fire extinguishers should be located in the kitchen or garage, in case of fires. Some fire alarms will dial an emergency number to call for help when the alarm goes off. Sprinklers can be installed in homes to help put out a fire. Contact local companies to see what might work best for you.

## Water Safety

Water can be harmful and cause damage. There are tub mats that change color when the water is too hot. Special valves for showers prevent the water from getting too hot. Some shut off the water when it reaches a specific temperature and can be installed in faucets and showerheads. There are also devices that let you know when the water levels in tubs or sinks get too high or overflow.

## Phones & Pagers

Cordless phones, cell phones, walkie-talkies and pagers can help in case of emergency. Many pagers allow you to call for help by pushing a button. A receiver beeps or vibrates telling the wearer you need help. Highlight speed dial buttons with emergency numbers to make it easier in case of an emergency.



*personal transmitter*

Some phones and phone services can help. They have a base station with a speakerphone and a small transmitter. The base station plugs into a power outlet and phone line and the transmitter can be clipped to a shirt pocket or belt buckle. When you press the button on the transmitter, a signal is sent to the base station. The base station then calls specific numbers for help. These can be family, friends, or 911 operators. The base station will continue calling until it gets an answer.

## Aids to Limit Access

Install fences and locked gates around pools, Jacuzzis or other water areas to keep family safe. You can even use gate alarms to alert you if someone opens one. There are alarms for the pool that float in the water. If something falls or drops in the pool the alarm goes off.

Wall-mounted soap and shampoo dispensers help keep them out of reach. You can use locks on cabinet doors and drawers where you store harmful products. Use other child proof devices like outlet plugs, stove or oven locks, and fridge locks. Use baby gates to keep someone out of a harmful area.

## Stabilizing Aids

Grab bars and handrails can be used to help people stand and walk. Put them in bathrooms, hallways, work areas, and along both sides of stairs. Handrails also work for people who get dizzy, have coordination problems, and walk with difficulty.

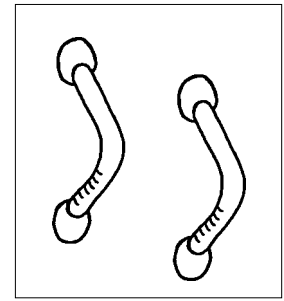
If a person stumbles easily, add more light to an area so they can see where they are walking. You can also use tread grips on stairs, or even put in ramps to keep someone from tripping and falling. A person can use a walker for more support when walking and moving around. Some have seats for a person to sit on if they get tired or baskets to carry things. You can also use the basket to carry things with you like a phone or medicine that you need to get to quick.

Seat lifts are cushions with springs that help a person stand up and gives them support to keep their balance. As you start to rise, the cushion lifts and helps you move up and out of the chair.

## Adaptive Utensils

If a person has tremors or spasms, they may have trouble holding onto things like cups, utensils, and cigarettes. There are low-tech devices that give support and reduce accidents and frustration. Heavy coffee cups with large handles and wide bottoms are less likely to be tipped. Oversized ashtrays, which have sand or water added to them, can reduce fire hazards. Utensils with large handles are easier to hold in your hand. You can modify your own knives, forks, and spoons by adding foam tubs or molding putty to the handles. You can get writing aids that are heavier or that have a larger platform to make it easier to hold. A heavier pen doesn't fly out of your hand as easy as a regular pen.

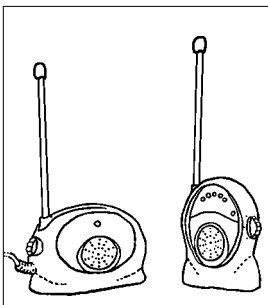
If you have trouble unlocking or locking doors, don't leave them unlocked and make your home unsafe. You can get grips or handles for your keys to make it easier to hold and give you more leverage to turn them. You can also get key-less door locks that use cards you swipe or keypads. All you have to do is punch in a number.



*safety grips*

## Things to Make Life Safer...

- Color code frequently used items, i.e., edibles like sugar, pudding, and cream are color coded blue; cleaning supplies are color coded red; personal care products like toothpaste, shampoo, and eye drops are color coded yellow
- Be attentive to the alerting signals family pets provide regarding visitors and emergency situations
- Replace or eliminate tools that pose risks
- Replace metal knives with plastic or rolling blades
- Attach brightly colored labels to materials that are hot, poisonous, flammable, or otherwise dangerous to identify products that are "off limits"



monitor

## Identification

Sometimes a loved one gets disoriented and wanders. The first thing is to have them wear or carry some type of ID. It should have their name, address and telephone. You can also use labels that are sewn or ironed on clothes. Be sure information is in a person's wallet or even worn as jewelry. Medic alert bracelets can let someone know of a special medical need. They can be purchased at local pharmacies.

You can also get talking ID's. Just record a name, address, and phone number, as well as any special needs in case of an emergency. When the button is pressed, the 20-second message plays, giving someone the information that they need to help.

National programs can be used for a one-time fee. A person is registered and given a bracelet or necklace to wear. This carries a toll free number and a brief message on what to do if found. Help is available 24 hours, 7 days a week, no matter where they are found. When the number is called, the program calls the family.

## Monitoring & Surveillance Devices

Electronic alarms can be hung on the metal doorknob of any non-metal door. If anyone touches the knob, the alarm sounds. Baby monitors can be used to monitor a room. Wireless doorbells used in businesses can be put on the bedroom door to let you know when it is opened. You can also use something as simple as bells or chimes that make a noise when they are moved. Motion detectors can alert you when someone is sleepwalking or wandering. Motion-sensitive lights also can be installed to draw attention to wandering. There are alarms that can be worn. If a person gets past a certain distance, the alarm goes off. It also helps you locate them.

High tech monitoring uses video cameras and microphones that let you see and hear anywhere inside or outside your home. Using a standard TV, you can monitor activity to prevent accidents and to keep everyone safe.

## Finding & Funding Assistive Technology & Services

Many of the devices in this book are low cost and easy to find in local retail stores or catalogs. However, other items can be more costly. It is good to know where you can turn to for help in finding these devices. It also helps to know about funding for these devices and for helpful services, such as assessment and training.

Funding is available from public and private sources. These include Medicaid, Medicare, Iowa Division of Vocational Rehabilitation Services, and the school system through IDEA. Funding also comes from private insurance, health and disability organizations, civic groups, and service organizations.

**InfoTech** is an information and referral service on adapted devices. You can call them toll free at **1-800-331-3027 (voice) or 1-877-686-0032 (TTY)**. They will give you information on who makes these devices. They can also give you information on where you might get funding. They will send you product information, as well as fact sheets on funding sources. You can also check out their web site at

<http://www.uiowa.edu/infotech/>

InfoTech is a service of the state of Iowa and is free of charge.

You can also call **Iowa COMPASS** toll free at **1-800-779-2001 (voice) or 1-877-686-0032 (TTY)**. They are an information and referral service on disability-related services in the state of Iowa. You can also visit them on their web site at

<http://www.medicine.uiowa.edu/iowacompass/>

Iowa COMPASS is also a statewide service in Iowa and free of charge.

This publication is available as a PDF file on the InfoTech web site above. It is also available on the web sites of the partners listed on the second page of this booklet.

