

The Effects of stroke

Different sides of the brain deal with different areas of human intellectual functioning. Stroke typically occurs in with the left or the right hemisphere.¹

Most common effects of a stroke:

- Paralysis or weakness on one side of body affecting mobility
- Vision problems
- Aphasia (difficulty in speaking, reading, writing or understanding language)
- Perceptual challenges
- Fatigue
- Incontinence (trouble controlling your bowels or bladder)
- Depression
- Emotional changes
- Memory or problem-solving challenges
- Personality changes



Left-brain stroke

The **left side** of the brain is known for its association with:

- Movement on the **RIGHT** side of the body
- Spoken language
- Reasoning
- Number skills
- Written language



Effects of a stroke on the **left side** of brain include:

- Weakened or paralysis on **right side** of body (hemiplegia)
- Speech and language challenges
- A tendency to be slow, cautious, hesitant, anxious, and disorganized when faced with an unfamiliar problem
- Difficulty finishing tasks - frequent instructions and feedback is required

Left brain stroke survivors need **frequent reassurance** and plenty of immediate positive feedback. **Breaking tasks down** into steps and practicing will often aid learning.

Right-brain stroke

The right side of the brain is known for its association with:

- Movement on the **LEFT** side of the body
- Creativity
- Music
- Spatial orientation – the ability to judge distance, size, position, movement, form and how parts relate to wholes
- Artistic awareness



Effects of stroke on the right side of the brain include:

- Weakened or paralysis on left side of body (hemiplegia)
- Vision problems
- Difficulty judging distance, depth, up and down or front and back movement – this can affect self-care and daily tasks
- Issues understanding maps
- Short-term memory difficulties
- Left-side neglect – forgetting objects or people on the left side
- Judgment difficulties – acting impulsively or not recognizing limitations

Right side stroke survivors may not be able to read a paper – not because they can't read, but because they lose their place on the page. These survivors may have a behavioral style that is impulsive and results in overestimating their abilities. They are often unaware of their deficits and may think themselves capable of tasks they are not, such as driving.

Brain stem strokes

The rarest type of stroke, brain stem strokes occur in the base of the brain above the spinal cord. This area effects:

- Breathing and heart function
- Body temperature control
- Balance and coordination
- Chewing, swallowing and speaking
- Vision
- And can result in weakness and paralysis on both sides of body

ⁱ Let's Talk about Stroke: An Information Guide for Survivors and Their Families, The Heart and Stroke Foundation, 2005.