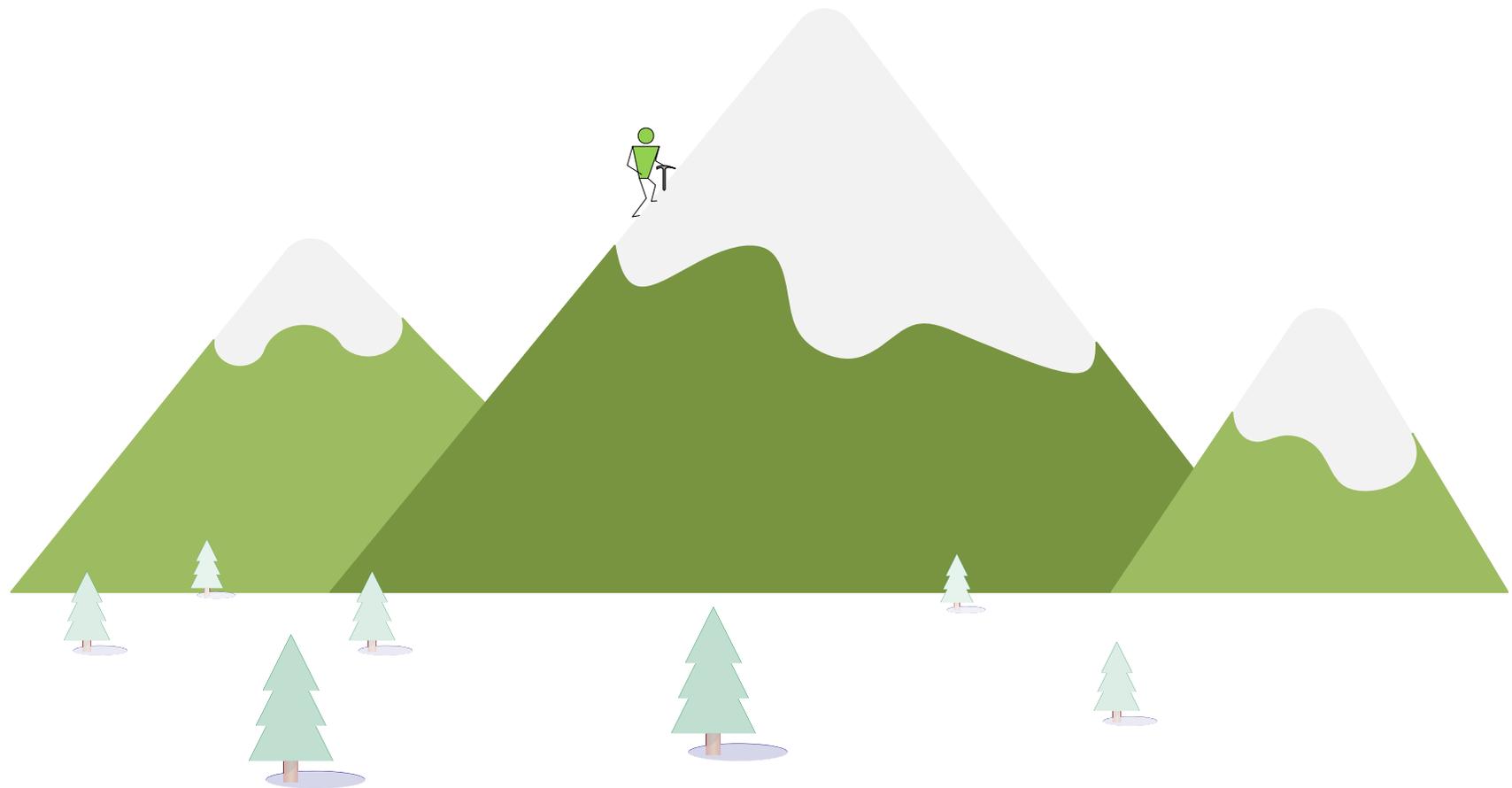


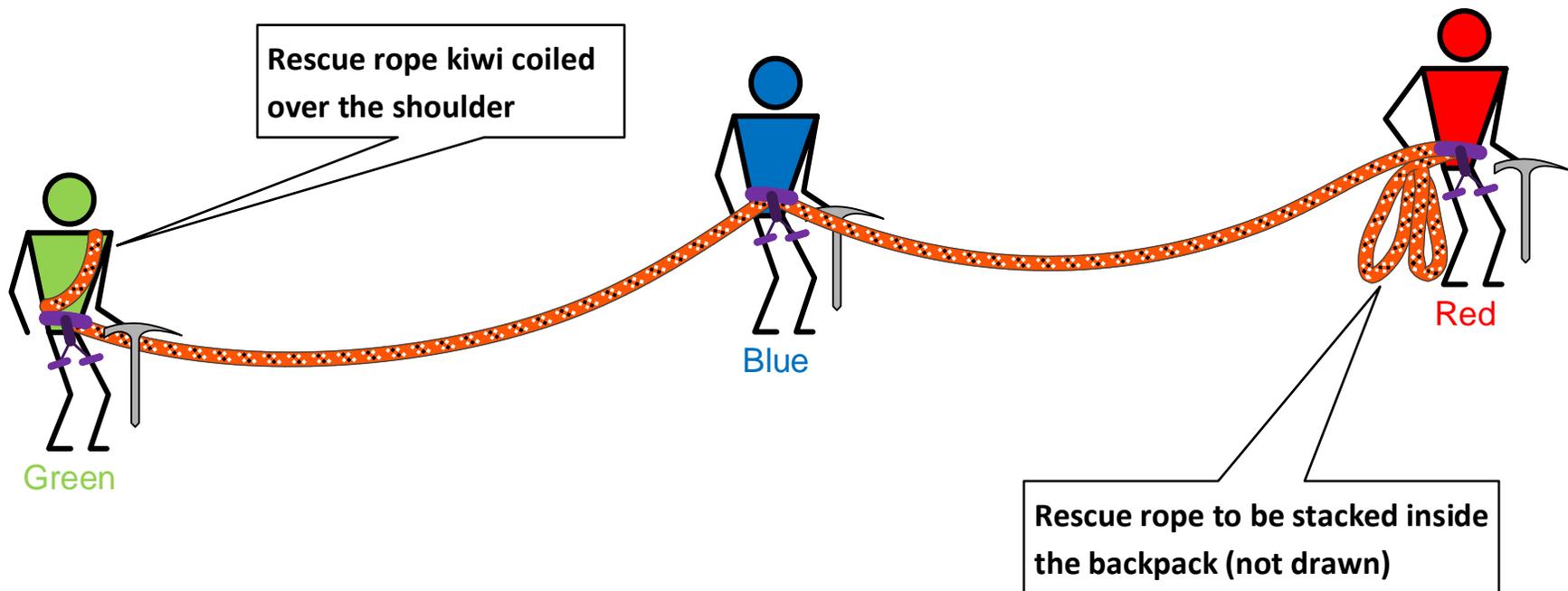
# An Illustration of Crevasse Rescue

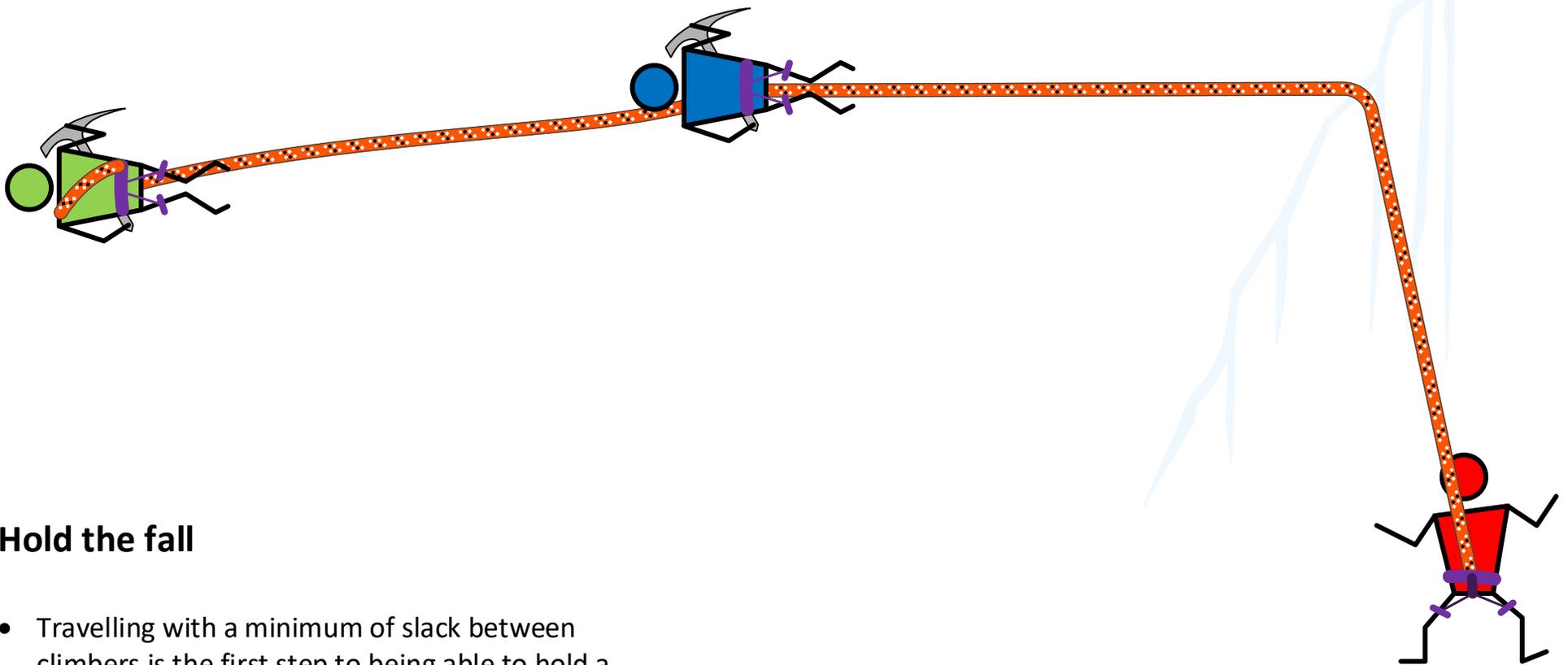
Revision 4. Jan 6th, 2018  
Author: Deling Ren



## Rope up for glacier travel

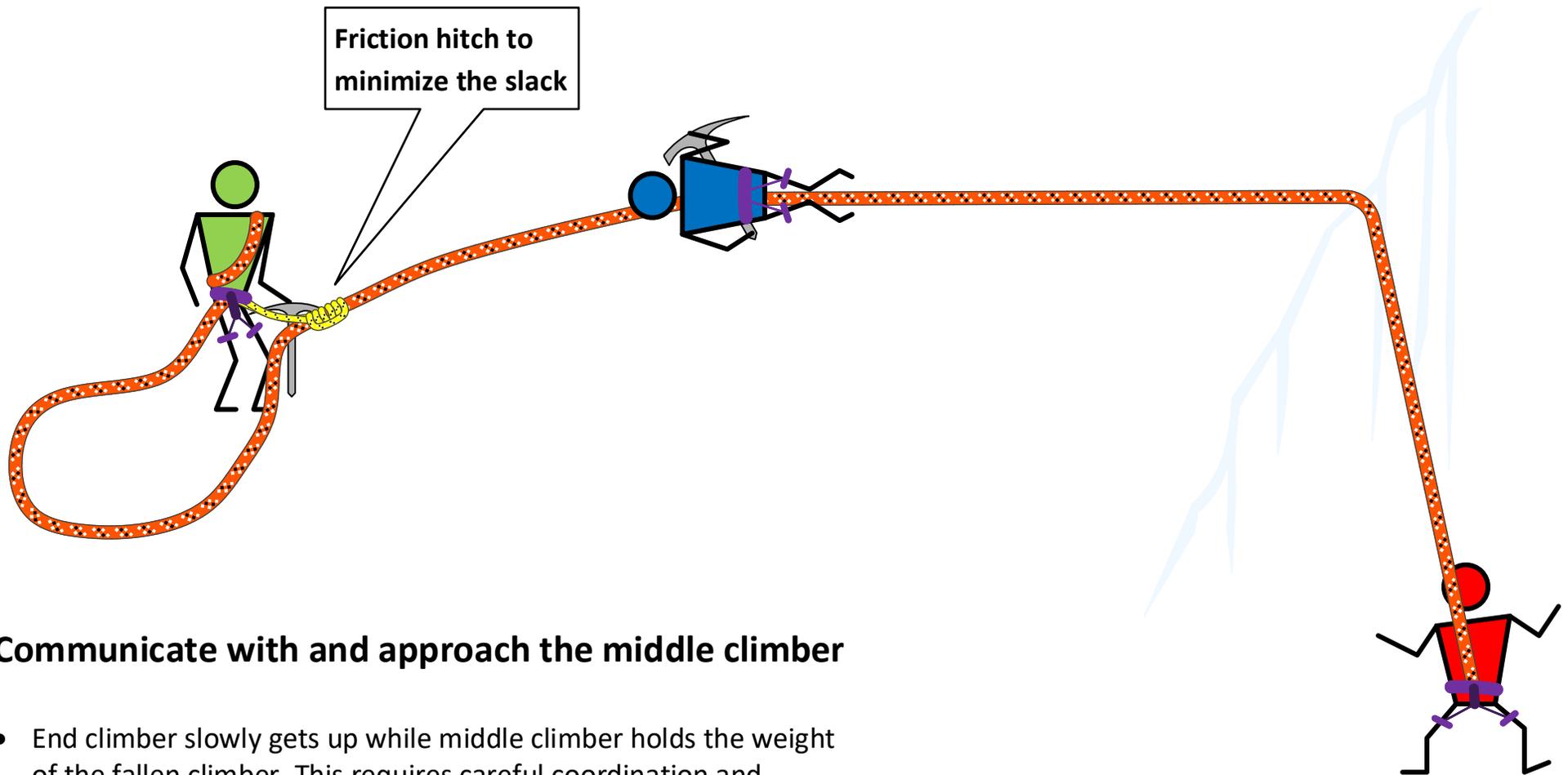
For a rope-team of 3 climbers, divide the rope into 4 lengths, with both end climbers carrying at least 1/4 of the rope (aka rescue rope). Either carry the rescue rope in the backpack or coil it on the shoulder.





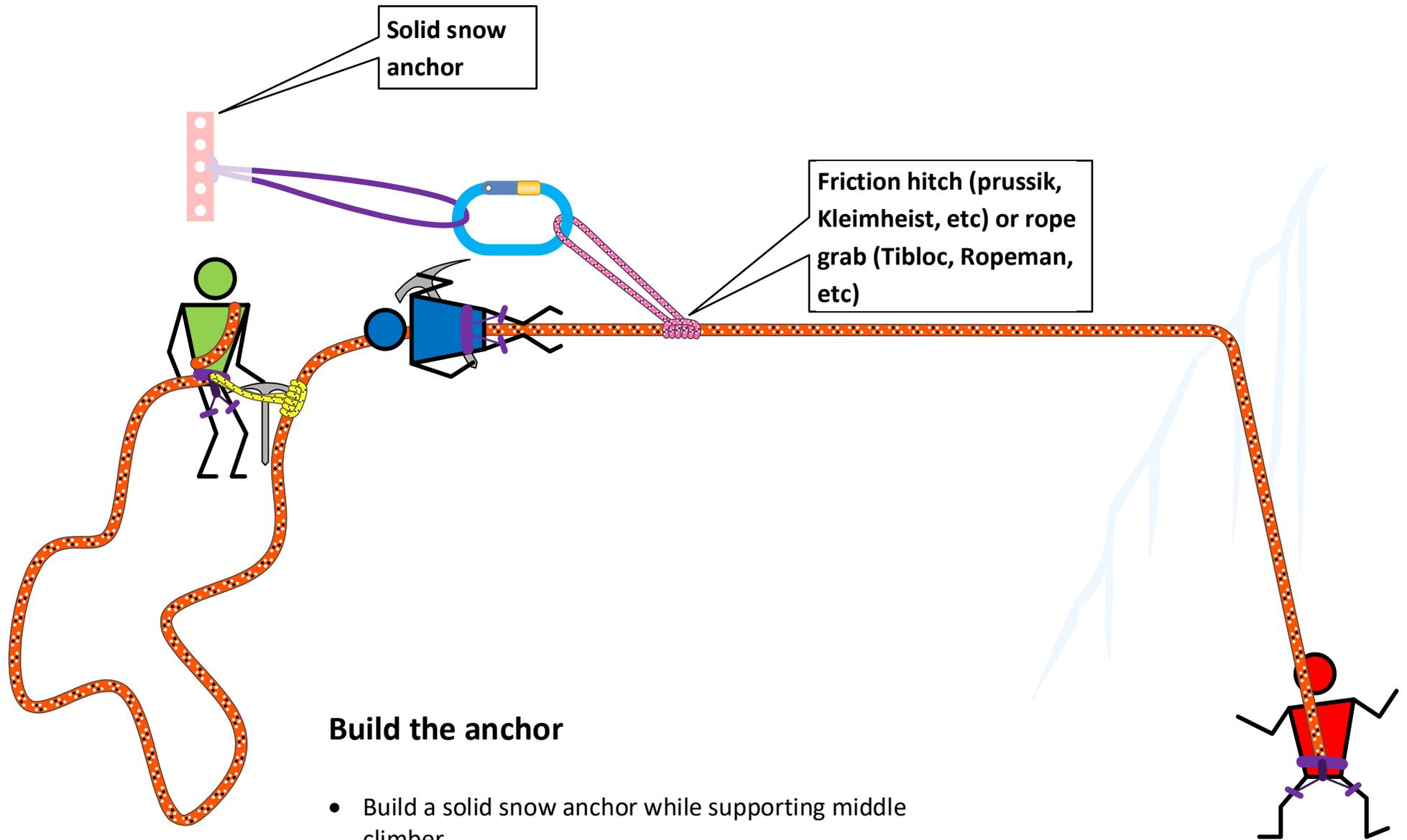
## Hold the fall

- Travelling with a minimum of slack between climbers is the first step to being able to hold a crevasse fall.
- Should a fall occur, lean back or fall away from the fallen climber. Make the rope tight between rope-mates.



## Communicate with and approach the middle climber

- End climber slowly gets up while middle climber holds the weight of the fallen climber. This requires careful coordination and communication between the two climbers.
- Approach middle climber carefully while probing for crevasses and use a friction knot to minimize the slack.
- Be ready to arrest again should the middle climber slip.

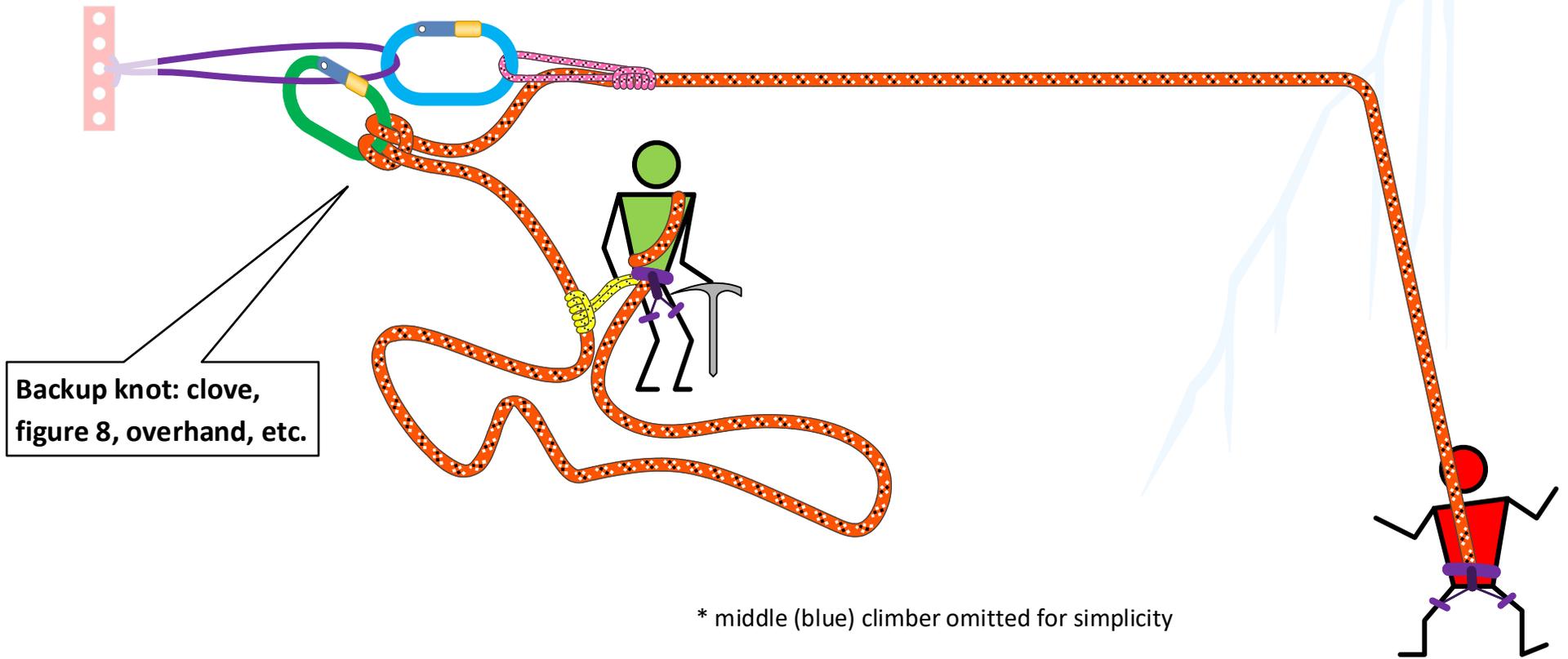


Solid snow anchor

Friction hitch (prussik, Kleimheist, etc) or rope grab (Tibloc, Ropeman, etc)

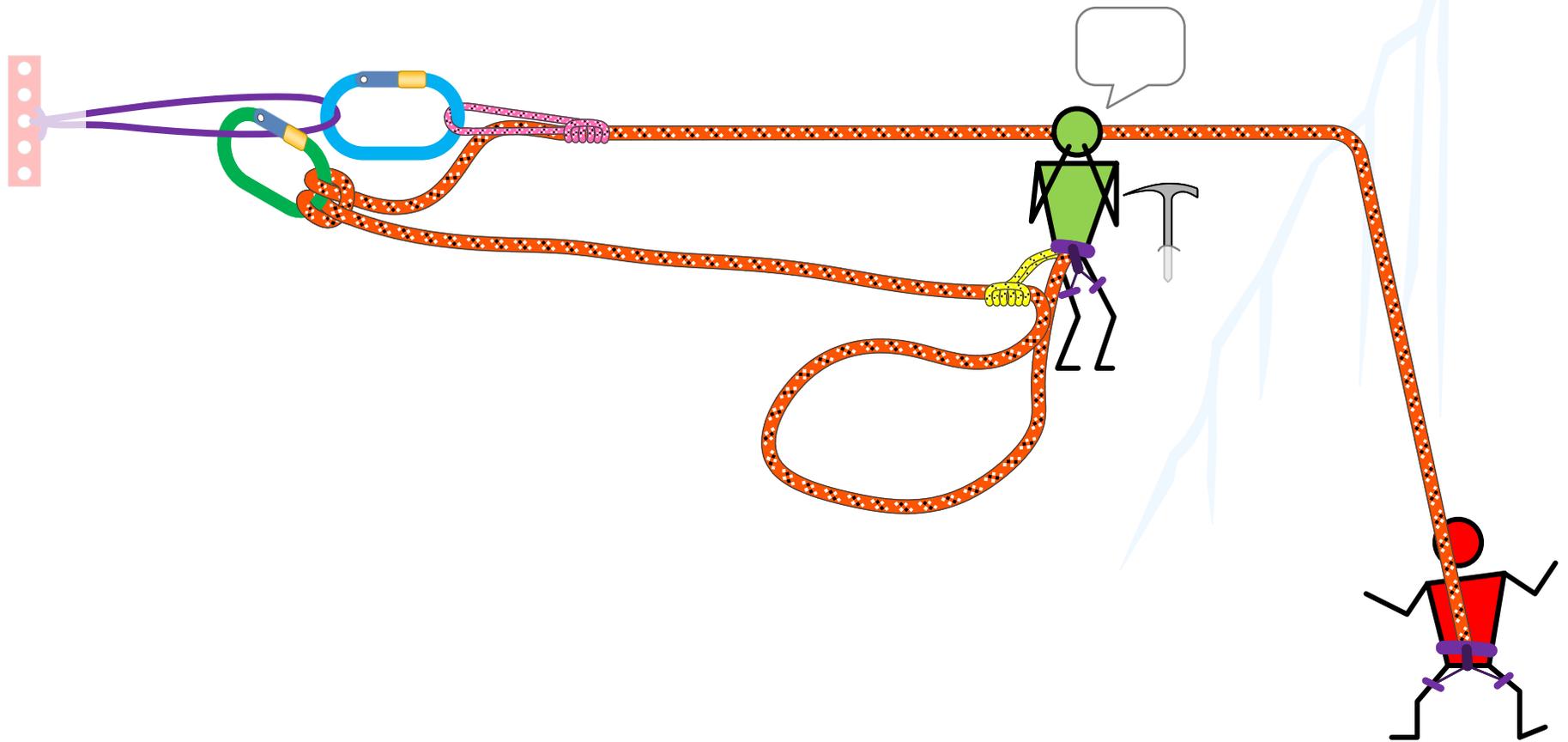
### Build the anchor

- Build a solid snow anchor while supporting middle climber.
- Examples of a solid anchor include T-slot and deadman. Equalize multiple anchor points if necessary.
- Connect the rope going to the fallen climber to the anchor using a friction hitch or rope grab.



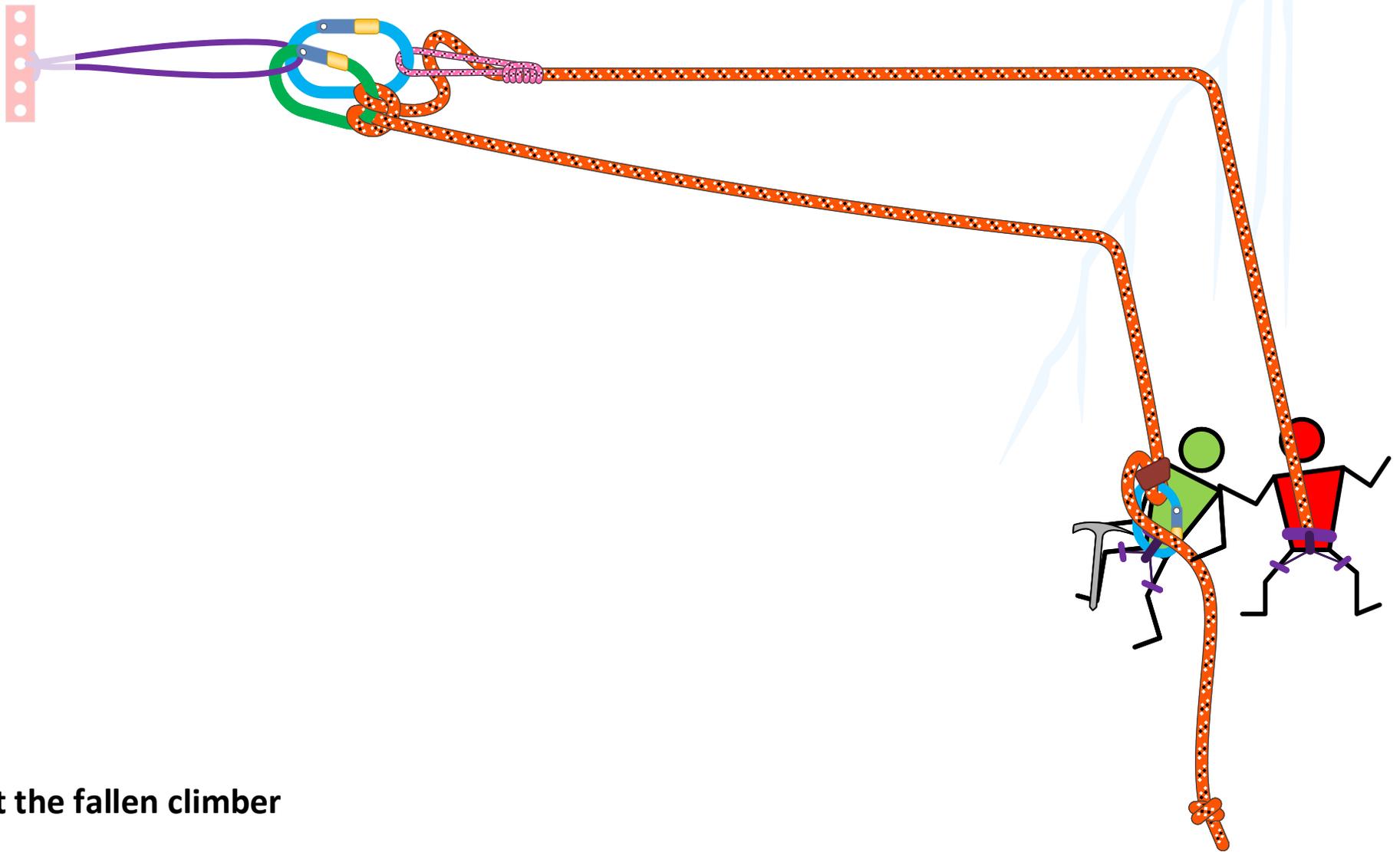
## Backup the friction hitch

- Transfer weight from the middle climber to the anchor by slowly getting up.
- Backup the friction hitch by tying off the loaded rope directly to the anchor.



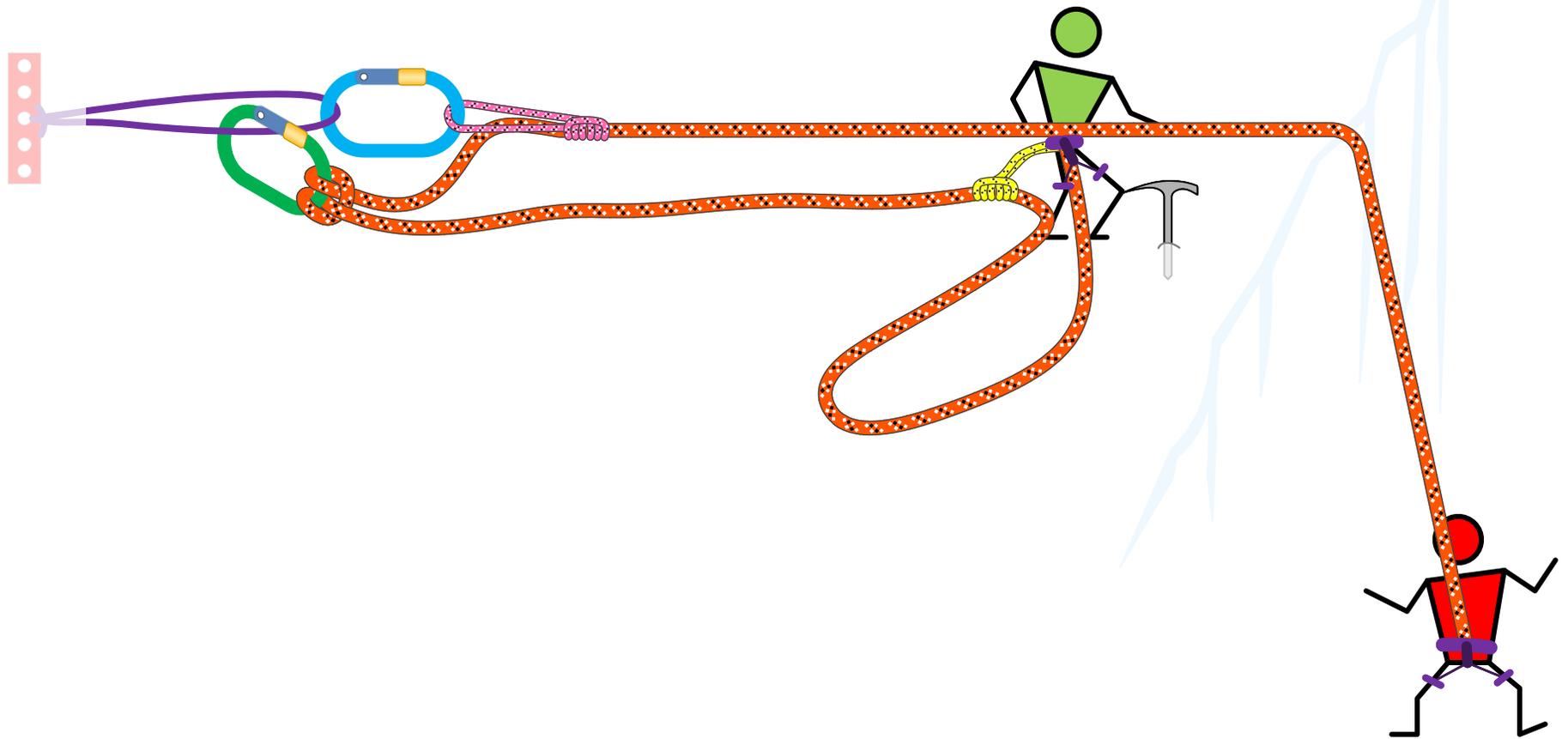
## Communicate with the fallen climber

- Safely approach the crevasse by self belaying off the anchor.
- Communicate with the fallen climber and assess the situation.



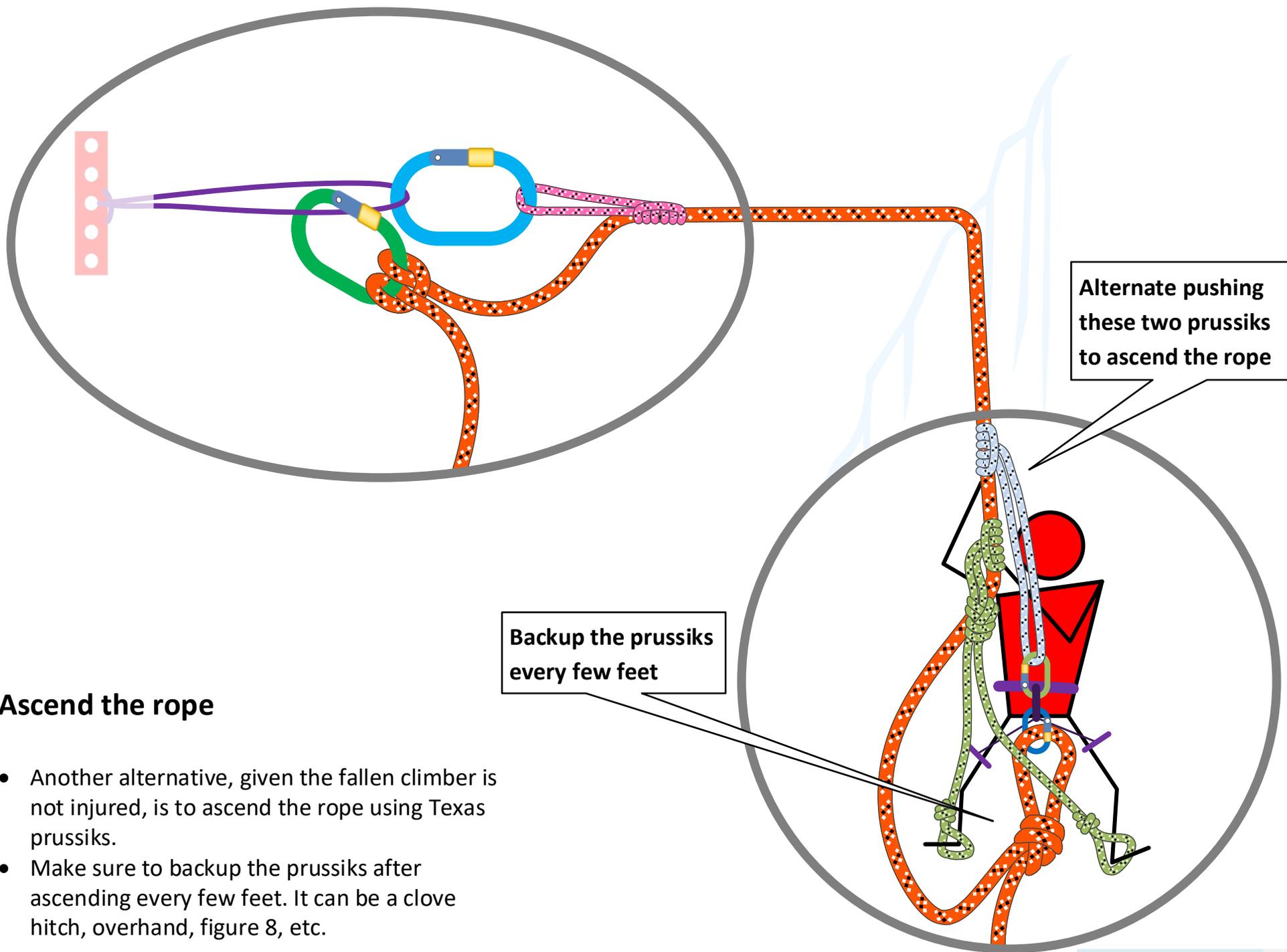
## Assist the fallen climber

If immediate first aid is needed, rappel down to the fallen climber.



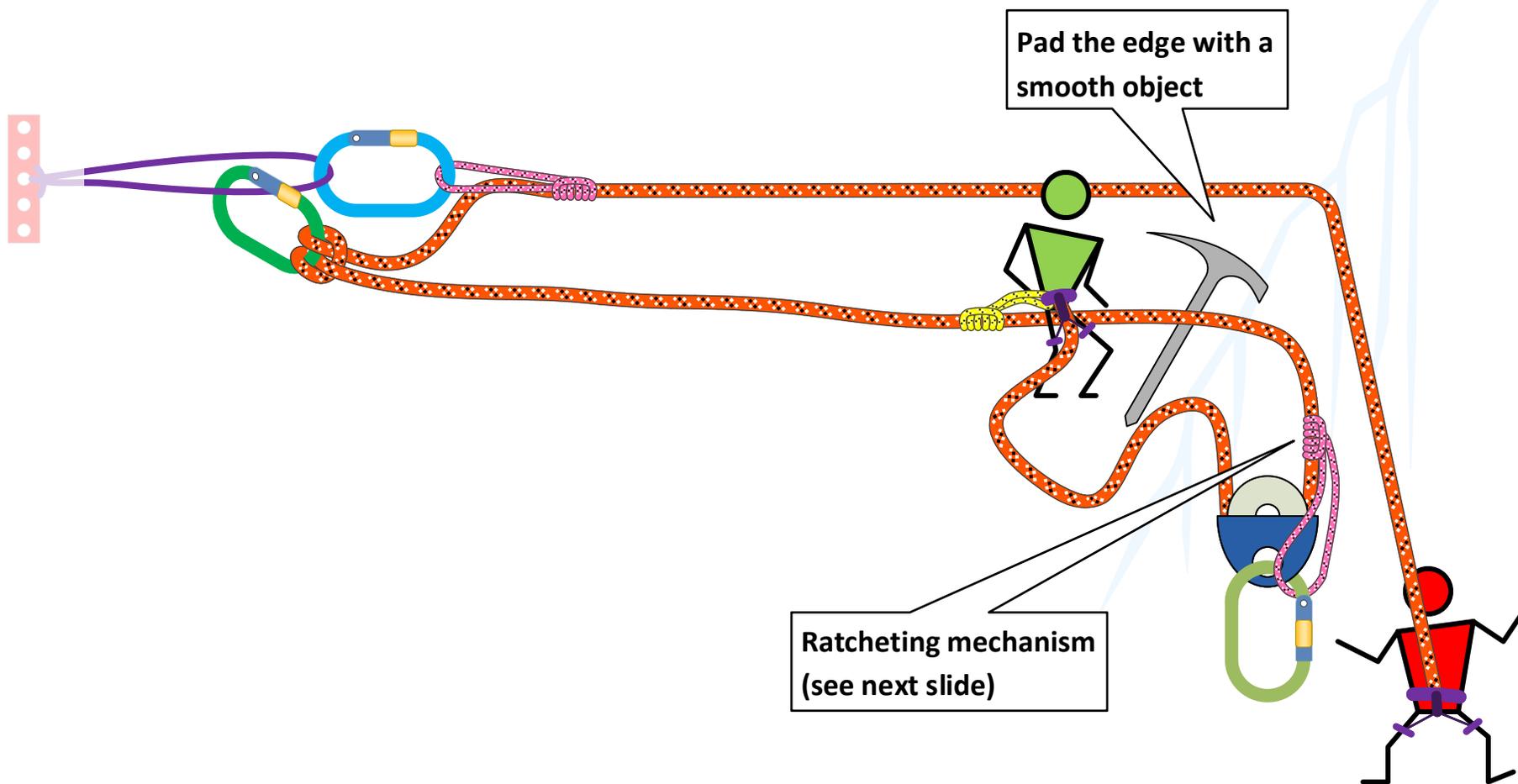
## Direct pull

Before rigging a complex raise system, consider easier alternatives, such as direct pull, if the terrain is mellow and the fallen climber is able to help.



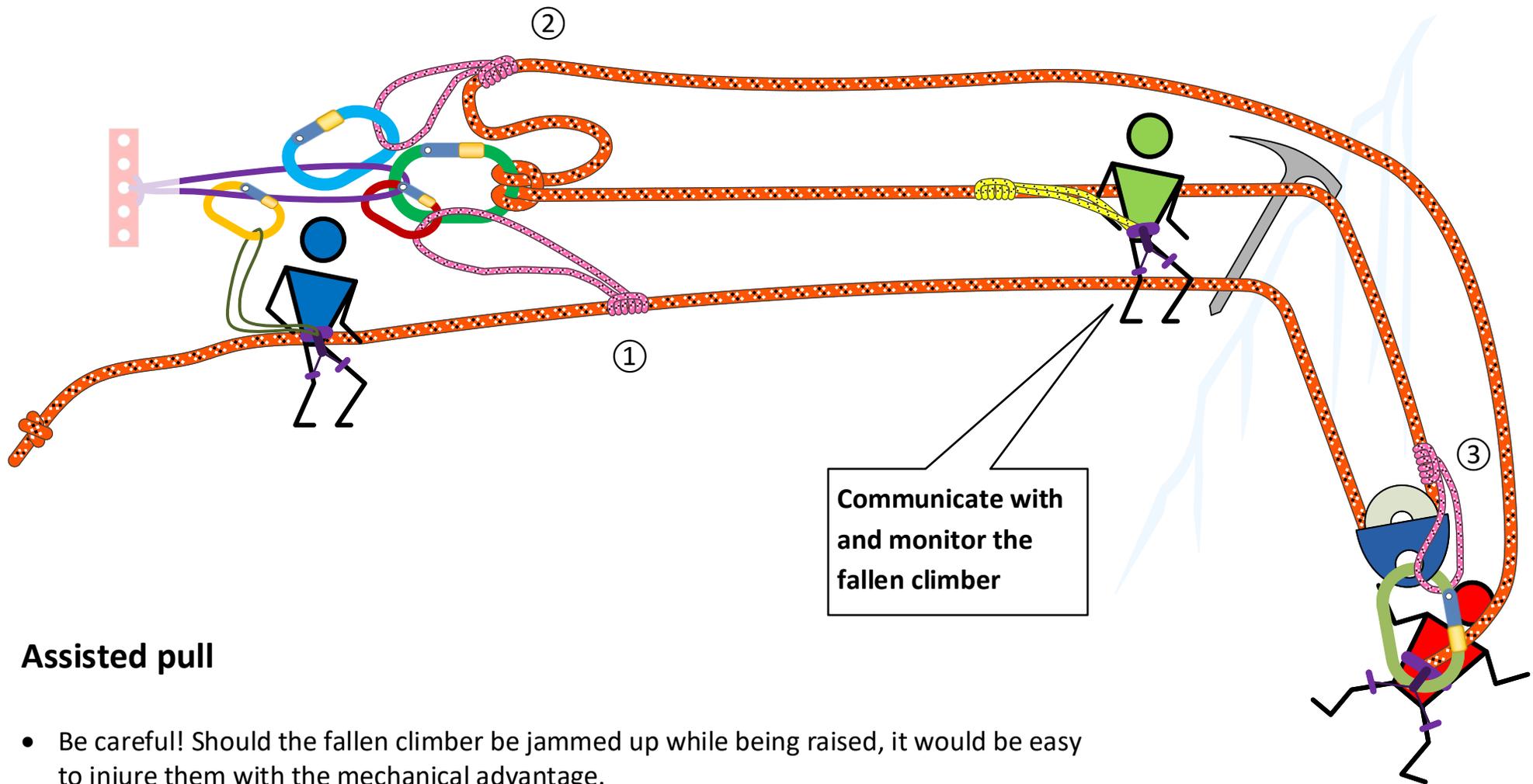
## Ascend the rope

- Another alternative, given the fallen climber is not injured, is to ascend the rope using Texas prussiks.
- Make sure to backup the prussiks after ascending every few feet. It can be a clove hitch, overhand, figure 8, etc.



## Drop-loop C-pulley

- If everything else fails, set up a raise system with mechanical advantage, such as 2:1 C-pulley system.
- This may require extra rope. This is where the rescue rope comes into play.
- Prepare the crevasse lip with a smooth object (e.g. shaft of an ice ax) to prevent the rope from getting entrenched.



## Assisted pull

- Be careful! Should the fallen climber be jammed up while being raised, it would be easy to injure them with the mechanical advantage.
- If possible have one person stationed and safely anchored near the crevasse, where he/she can communicate with and monitor the fallen climber during the raise.
- To avoid dropping the fallen climber and shock loading the anchor, a progress capturing device should be employed. This can be ① a friction hitch on the pulling strand, ② the friction hitch already on the original strand going to the fallen climber, or ③ a ratchet on the pulley. In the first two cases, someone needs to tend the friction hitch. In the last case, some pulleys are self tending but still should be attended to to avoid jamming. If the fallen climber is seriously injured, avoid this option.