

92. Poles - Erecting (Hand)

Good working plans will provide for poles to be erected as soon as practicable after the holes are dug. This will eliminate caving and reduce physical hazards to people and animals.

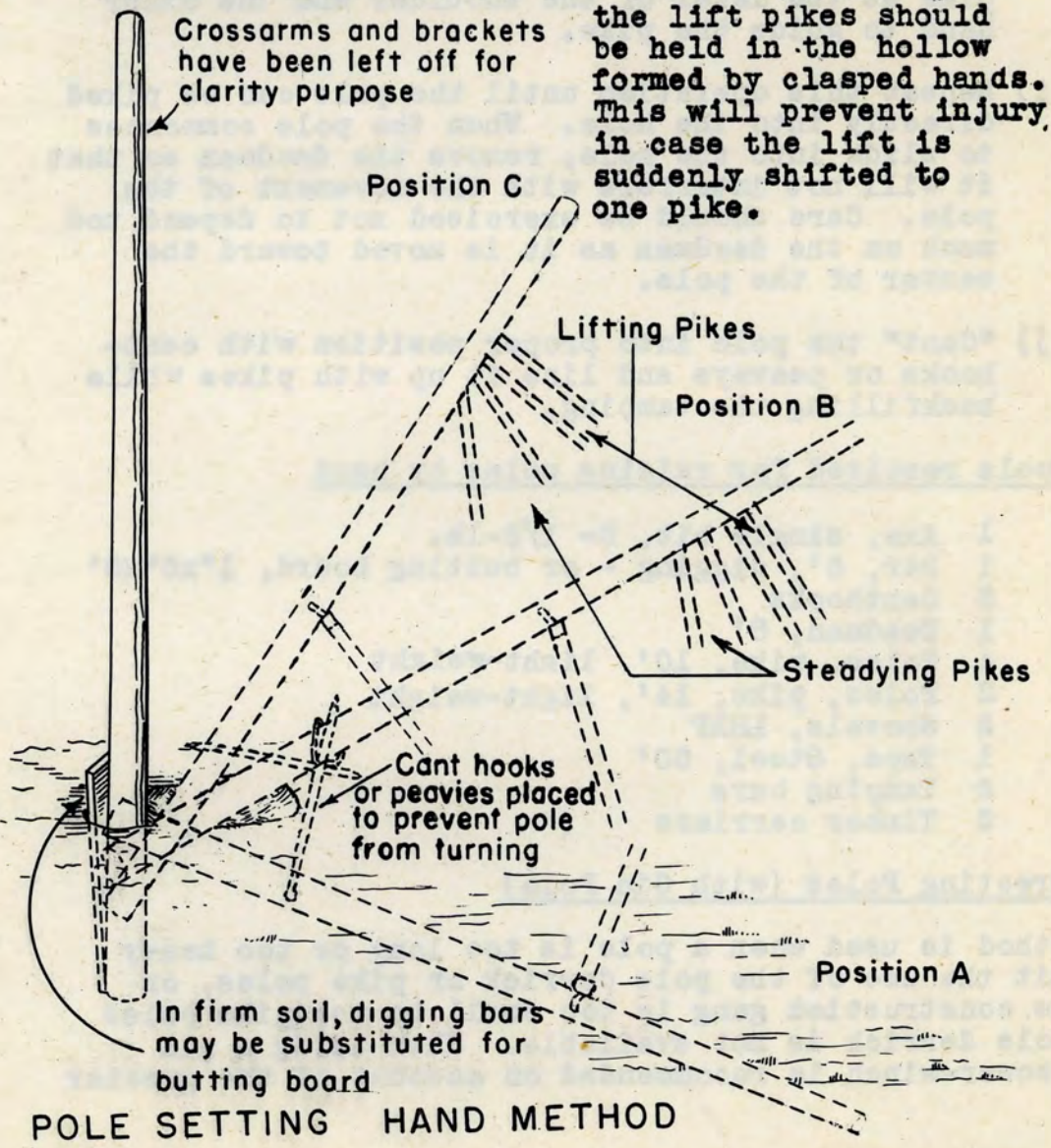
The success of the pike pole method of setting poles, and the safety of employing it, depend upon the intelligent cooperation of the men. Each man should be assigned a definite part of the work and should make himself proficient in it. Do not wear climbers or body belts while piking poles. Make certain that footing is secure before attempting to raise the pole. Nothing should be left under foot which would be an obstacle to raising the pole or contribute to an accident.

Light weight poles, 25-foot and smaller, may be set without the use of a deadman or canthooks. Two pike poles are sufficient. Use butting board.

For medium-weight poles, 25 to 35-foot, proceed as follows:

- (a) Place butting board, preferably 1" x 6", or digging bars (in firm soil only) in the hole on the side opposite the butt of the pole.
- (b) Move pole into position with the butt against butting board or bars. When using a bar, a small "V" notch cut in butt of pole will prevent its slipping off the bar.
- (c) Place "deadman" or "jenny" on the ground near the top of the pole and approximately at right angles to the pole. The fork of the deadman should be against the pole and the footing should be at a point where it will not slip when the pole is lifted and the weight is supported by deadman. (Position A). Station a man to guide the deadman as the pole is lifted and to prevent its slipping either along the pole or on the ground. The man handling the deadman should, at all times, avoid standing directly under the pole.
- (d) With sufficient manpower, lift pole and deadman to Position B.

- (e) Place a man about two feet above probable ground line holding two canthooks or peaveys, one to pull against the other, to prevent the pole from turning as it is being raised.
- (f) Place Pike poles near the top of pole, one on each side to steady the pole as it rises and the others distributed slightly to each side to do the lifting. At this stage, the side pikes should be held with the two hands separated and the lift pikes should be held in the hollow formed by clasped hands. This will prevent injury in case the lift is suddenly shifted to one pike.



- (g) Raise the pole, moving the deadman forward with the lift to furnish support to the pikes. (Position C.) In changing the location of the deadman, keep it in instant readiness to support the entire weight of the pole.
- (h) Apply pikes further down the pole. (Position C.) Shift the pikes one at a time. Raise the pole again. When the pole passes the 45° angle, the men on lift pikes may work to better advantage if they use one hand to support the butt of the pike at the level of the shoulder and the other hand to guide the pike.
- (i) Repeat this operation until the pole can be piked directly into the hole. When the pole commences to slide into the hole, remove the deadman so that it will not interfere with the movement of the pole. Care should be exercised not to depend too much on the deadman as it is moved toward the center of the pole.
- (j) "Cant" the pole into proper position with cant-hooks or peaveys and line it up with pikes while backfilling the tamping.

93. Tools required for raising poles by hand

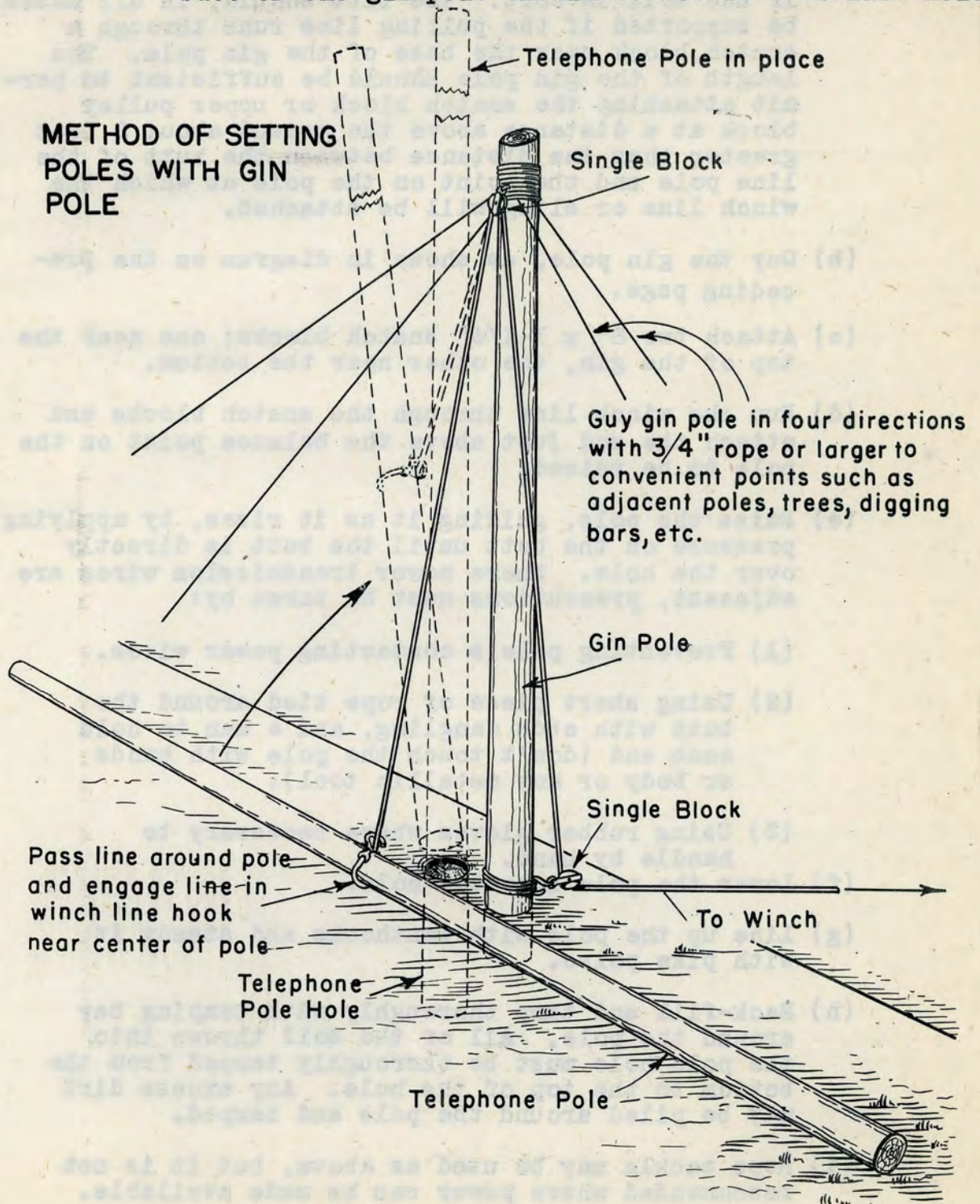
- 1 Axe, single bit, 3- 1/2-lb.
- 1 Bar, 8', digging - or butting board, 1"x6"x8'
- 2 Canthooks
- 1 Deadman, 8'
- 4 Poles, pike, 10', light-weight
- 2 Poles, pike, 14', light-weight
- 2 Shovels, LHRP
- 1 Tape, Steel, 50'
- 2 Tamping bars
- 3 Timber carriers

94. Erecting Poles (with Gin Pole)

This method is used when a pole is too long or too heavy to permit the use of the pole derrick or pike poles, or when the construction gang is too small to use pike poles and a pole derrick is not available. When using a gin pole a power-winch is recommended on account of the greater

convenience and in order to avoid the use of the large amount of rope that would be required if pulley blocks are used. When setting poles with the gin pole, proceed as follows:

- (a) Erect a gin pole suitable length (class 5 or larger) as close as practicable to the hole which has been dug for the line pole. Where conditions permit, the butt of the gin pole should be set in a shallow hole



to prevent it from slipping. Where conditions make it preferable, the butt of the gin pole may be guyed four ways rather than setting it in a hole. Where there will be no tendency for the butt to slip, it may be set on the ground, or on a plank if the soil is soft. The butt should, in all cases, be supported if the pulling line runs through a snatch block near the base of the gin pole. The length of the gin pole should be sufficient to permit attaching the snatch block or upper pulley block at a distance above the ground about 2 feet greater than the distance between the butt of the line pole and the point on the pole at which the winch line or sling will be attached.

- (b) Guy the gin pole, as shown in diagram on the preceding page.
- (c) Attach two 8" x 1-1/4" snatch blocks; one near the top of the gin, the other near the bottom.
- (d) Run the winch line through the snatch blocks and attach the end just above the balance point on the pole to be raised.
- (e) Raise the pole, guiding it as it rises, by applying pressure on the butt until the butt is directly over the hole. Where power transmission wires are adjacent, precautions must be taken by:
 - (1) Preventing pole's contacting power wires.
 - (2) Using short piece of rope tied around the butt with ends dangling, and a man to hold each end (don't touch the pole with hands or body or any metallic tool).
 - (3) Using rubber gloves where necessary to handle by hand.
- (f) Lower the pole into the hole.
- (g) Line up the pole with canthooks and steady it with pike poles.
- (h) Back-fill and tamp thoroughly with tamping bar around the pole. All of the soil thrown into the pole hole must be thoroughly tamped from the bottom to the top of the hole. Any excess dirt may be piled around the pole and tamped.
- (i) Rope tackle may be used as above, but it is not recommended where power can be made available.