

Route marking with Routearrows

WHY: The purpose of route marking is to direct and reassure riders while on your chosen route. The task of the marking crew is to place the Routearrows for optimum effect. **Safety of the marking crew is paramount.** Mark during low traffic, daylight hours. Wear high visibility clothing, work in teams. Keep your eyes on approaching traffic. If possible, park past the turn and work back to first arrows so that you face oncoming traffic.

WHAT to bring while marking: Routearrows rolls! Route maps, safety vests or very bright clothing and a stiff broom. Wear soft soled, smooth tread shoes. Use a small, easy to park vehicle. A two person crew is always best.

WHEN: For best results, mark the route within 24 hours of the event but within 48 hours is ok if the route has low traffic volume. Some events mark their routes the morning of with success, assuming short/easy routes or with multiple marking crews. Marking the route more than 3-4 days in advance is not recommended due to the reduced visibility of the arrows from wear and sun exposure and the increased chance of arrow loss.

WHERE: Consider what zone or "line" the cyclists will be riding on a given road section and place the arrows directly under or slightly to the left of this line. This should be left of the white "fog line" where the asphalt is smoother, cleaner, and also, where the arrows will be worn away the fastest by car traffic. With a very wide (10+ feet) shoulder or a wide designated bike lane, place the arrows just to the right of the white line, on the far left of the Bike Lane. On "shoulderless" narrow roads, place the arrows 2 to 3 feet left of the road edge. Again, this line will be smoother and cleaner and is where most cyclists will be riding. One possible reason to place arrows out to the right, near the road edge, is to prolong their lifespan if rain is expected just before or during the event. Avoid placing the light color Routearrows, Yellow or Lime, on the white "fog line" or intersection "Stop Line".

TIP: *Have Routearrows on signs at the event check in table to introduce the riders to each arrow color.*

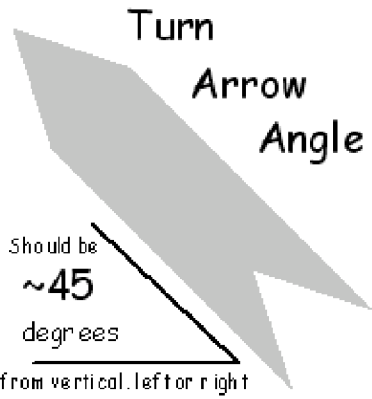
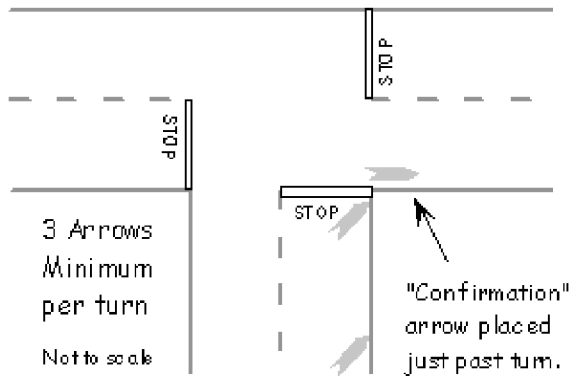
HOW: Routearrows must be placed on clean, dry pavement, the smoother the better. They will not stick to damp, dirty or very cold pavement. Sweep away any dirt or gravel or choose another spot. On rough pavement, i.e. "chip seal", use ample foot pressure to assure a good bond. **KEY:** *When marking turns, place all pre turn arrows at 45 degrees, either pointing up left or up right.* This makes it easier to discern the intended turn direction sooner. The last or "confirmation" arrow should be placed parallel to the new direction of travel. On some events, especially those with newby riders, it can be very helpful to place pairs of "affirmation" arrows at some key locations. These tell the riders "You're ok, keep going" or "Don't turn there, continue straight!" **TIP:** *Before exiting the vehicle, unpeel needed arrows from roll, stick them on your clothing and leave roll in vehicle. Be careful not to let any arrows stick together, they won't come apart.* Walk to first placement, remove an arrow from your shirt, place it on the road and press it down with repeated foot pressure. Walk to next marking point, repeat!

HOW MANY: Obviously, not all turns are created equal. Decide on an arrow pattern and strive to be consistent throughout. Some "no-brainer" turns such as "T" intersections with stop signs, may need only three arrows. Sweeping riders across traffic into a left turn lane might need seven arrows or more. Don't use fewer than three arrows, they're cheap insurance. I recommend five arrows per turn as a base line; three arrows spaced out individually before the turn, one right at the stop line and one "confirmation" arrow within 10 feet after the turn. Fewer arrows may be used when multiple routes are on the same road as multiple arrow colors side by side enhance visibility. **KEY:** *Rider approach speed must be considered. Fast rider speed = more distance from turn.* Riders doing ten mph travel almost 15 feet per second. A ten second warning, therefore, requires seeing the first turn markings at least 150 feet before the turn and 300 feet before the turn if some riders could be doing 20+ mph in pace lines. Decide on your desired notice time and work out both the distance from the turn and arrow spacing. Extra turn notice time = safer, happier riders. **KEY:** *Do a count and determine the total number of arrows needed per route, allowing for any additional marking needs.* Running out of arrows just before the last turn is no fun.

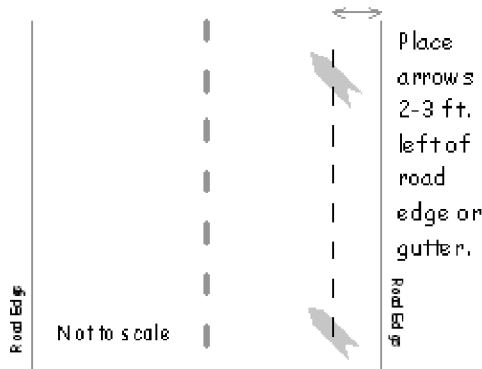
OPTIONS: 1) Hazard marking (i.e. potholes, cracks, abrupt edges) with an additional (non route) Routearrows color or spray paint. Liability issues are involved so consult with your insurance provider and or legal counsel. 2) If Routearrows must be removed, those not well pressed down *might* peel up within a few hours. But a good method is to wet the arrow, let it soak a bit, then scuff the arrow into mush with your foot. Scuffing dry can also work.

Route arrows: Illustrated

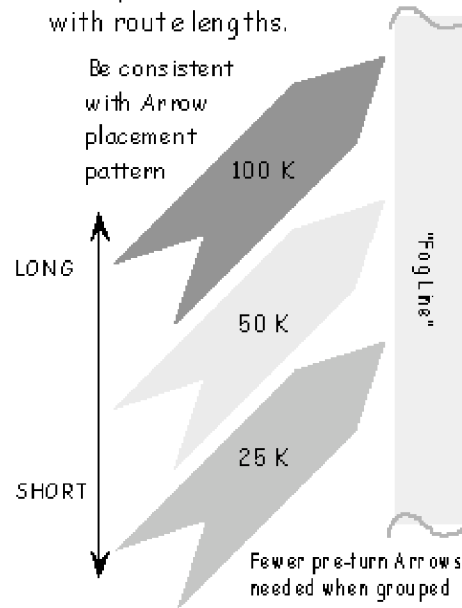
On "no-brainer" turns



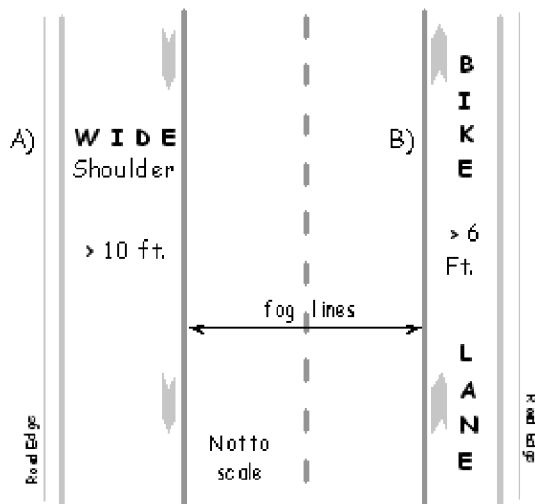
On "shoulderless" roads or on narrow urban streets....



Example: Placement correlated with route lengths.

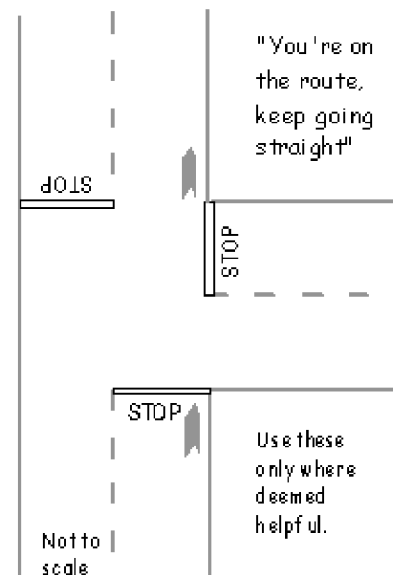


Place arrows "outside" fog line in either of these conditions.



Otherwise, place Arrows "inside" fog line where they will be worn away faster.

"Affirmation" arrows say....



Disclaimer: *These are recommendations only, subject to your individual needs, interpretations and road conditions.*