



**Welcome to**  
**Introduction to Orienteering**

**Minnesota Orienteering Club**

# Why orienteer ?

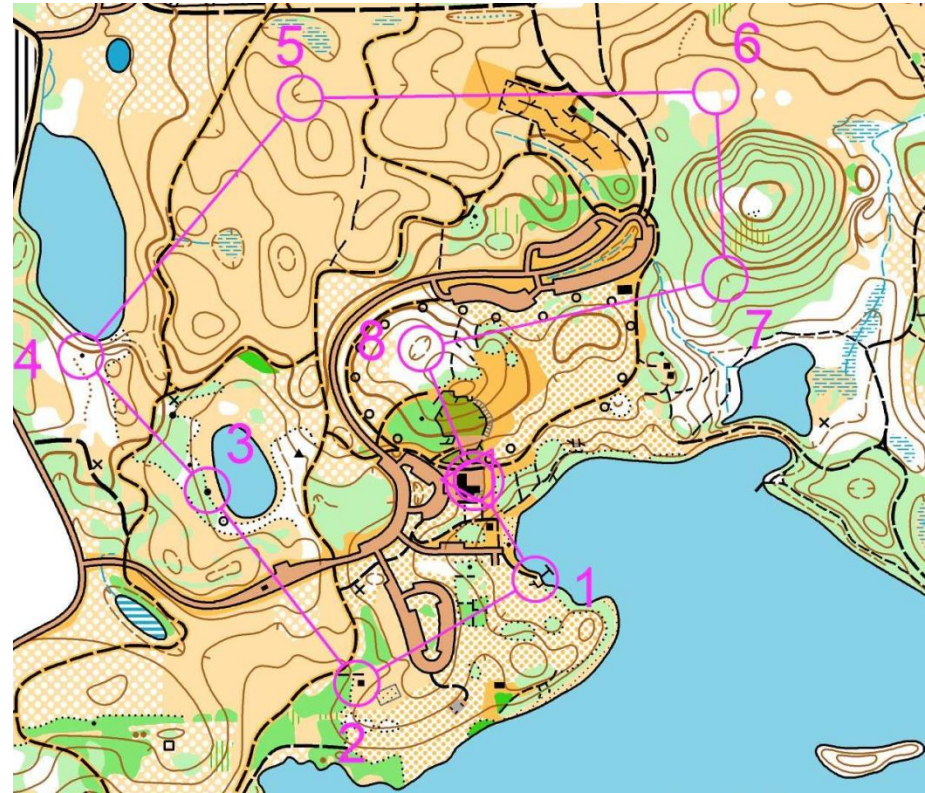


- Build skill and confidence to travel in unfamiliar places. Getting lost can ruin your day !
- Hiking/ Jogging with a purpose in a beautiful setting
- Satisfaction of accomplishing a difficult task without help. Self reliance.
- Fitness ... running or walking
- Physical and intellectual exercise at the same time (the best of both worlds)
- Fun for all ages and abilities

# The Basics of Orienteering



- Object: Finding a number of control points marked on the map, located in park but not hidden.
- In order
- Against time - if you wish
- Using map & compass and clue sheet
- Alone or with friends



# Controls



- Placed in terrain and marked correspondingly on a map.
- Has a unique “punch” to punch the control card
- Has a clue (e.g. hilltop)
- Control ID number
- A course is a preset number of controls.



# 3 basic skills

- Reading what's on the map
- Understanding scale and distance
- Orienting the map



# Clue sheet Example



- White/Yellow/Orange/Brown/ Green/ Red: difficulty levels as you prefer
- Clue sheet gives the order, the flag number and the feature

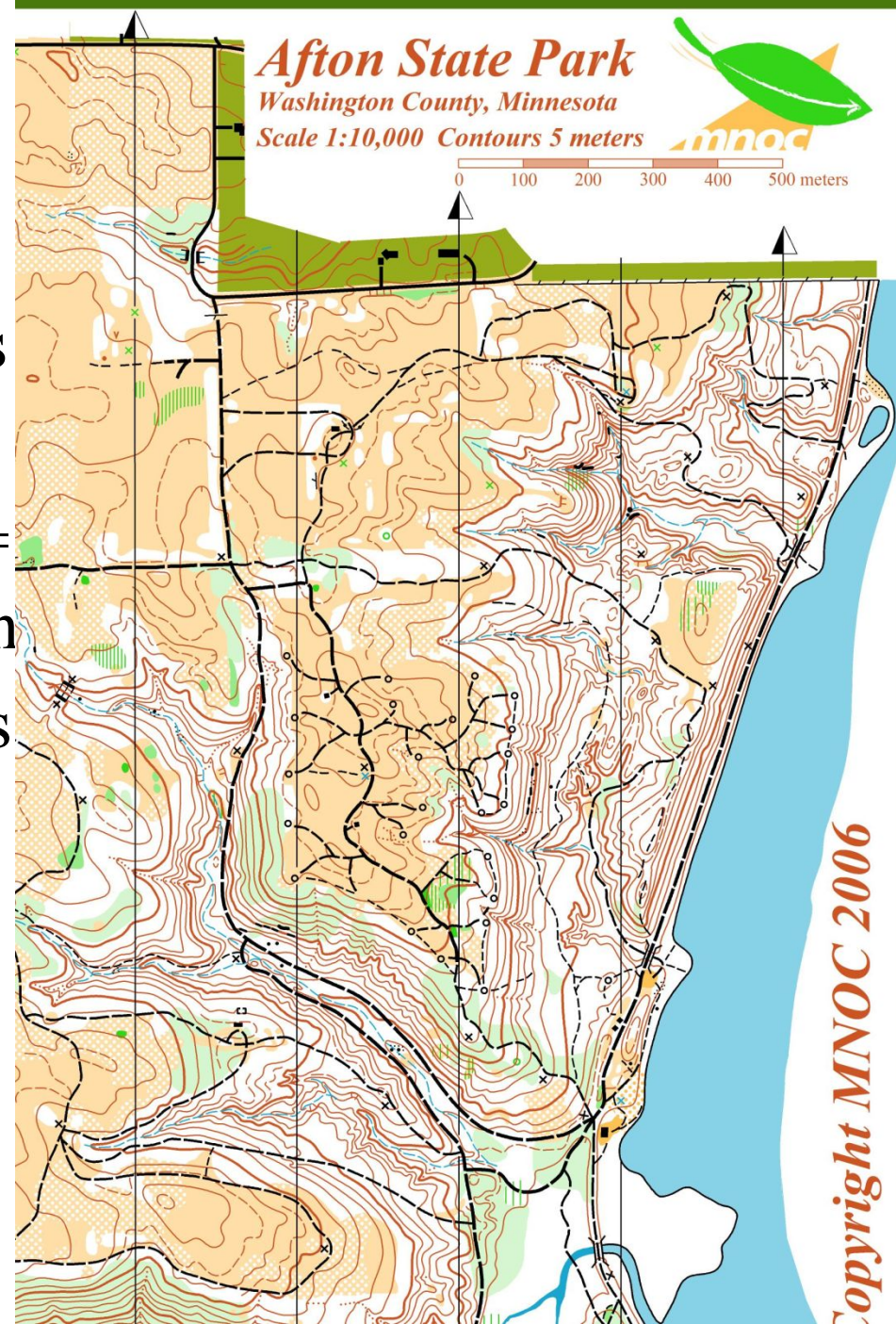
```
WHITE      3.5 km 75 m climb

Start:      Building
1- 102      trail junction
2- 106      stream junction
3- 108      S tip of marsh
4- 113      Hilltop
5- 115      Stream bend
Finish:     Building
```

# Important features in a map

- Brown = earth forms
- Black = man-made objects
- Blue = water
- Green, *Yellow and White* = various kinds of vegetation
- Magenta = course symbols

- **STUDY THE LEGEND**
- **Check MAGNETIC DECLINATION**
- **USE THE SCALE**



# Map scale... size



- Very important to keep good relationship between the map and the terrain
- 1: 10,000 means  
1 mm on the map is 10,000mm or 10 meters on the ground

Note: most USGS maps are 1:24,000

1 mm on map = 24,000mm = 24 meters on the ground

Or 1 inch = 24,000 inches = 2000 feet on the ground

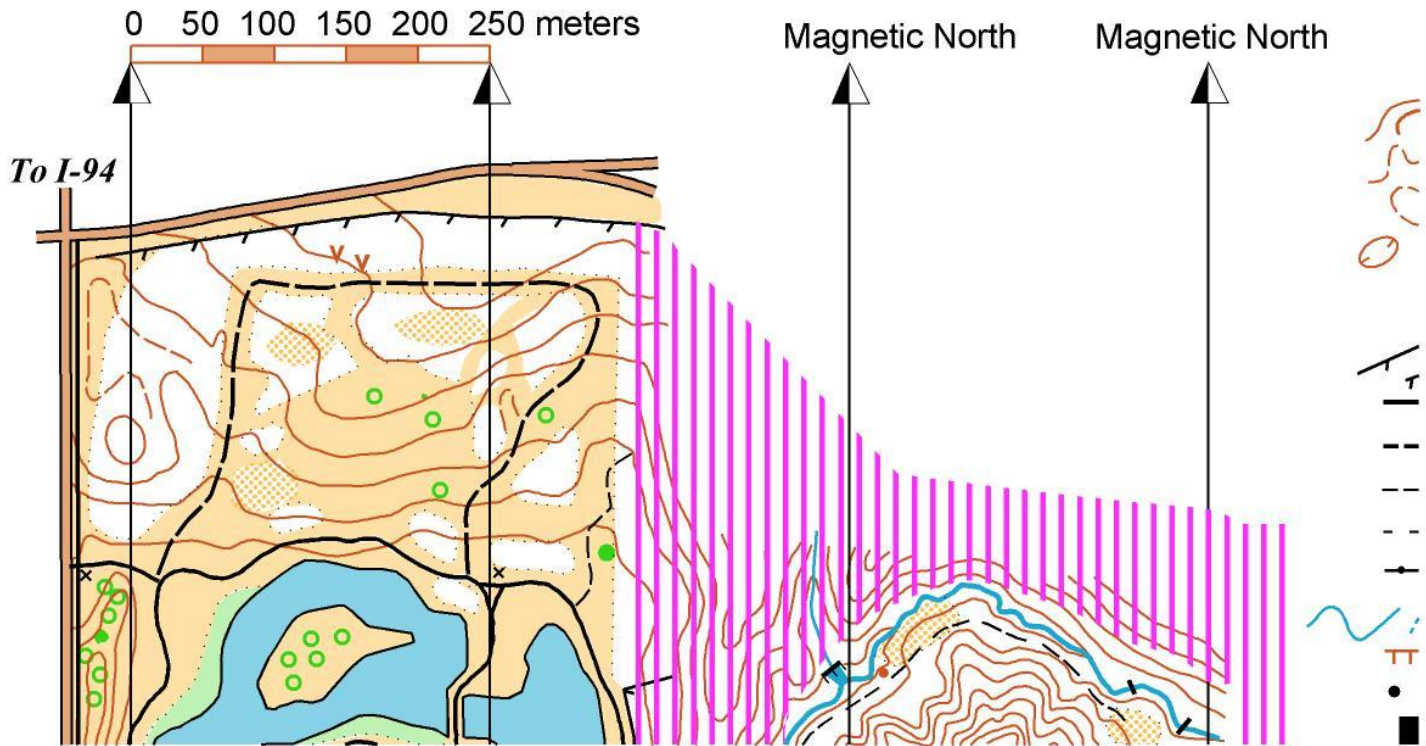
**Forget the math : Use the scale ruler on the edge of the map**



# Scale and distance

## BATTLE CREEK REGIONAL PARK (East)

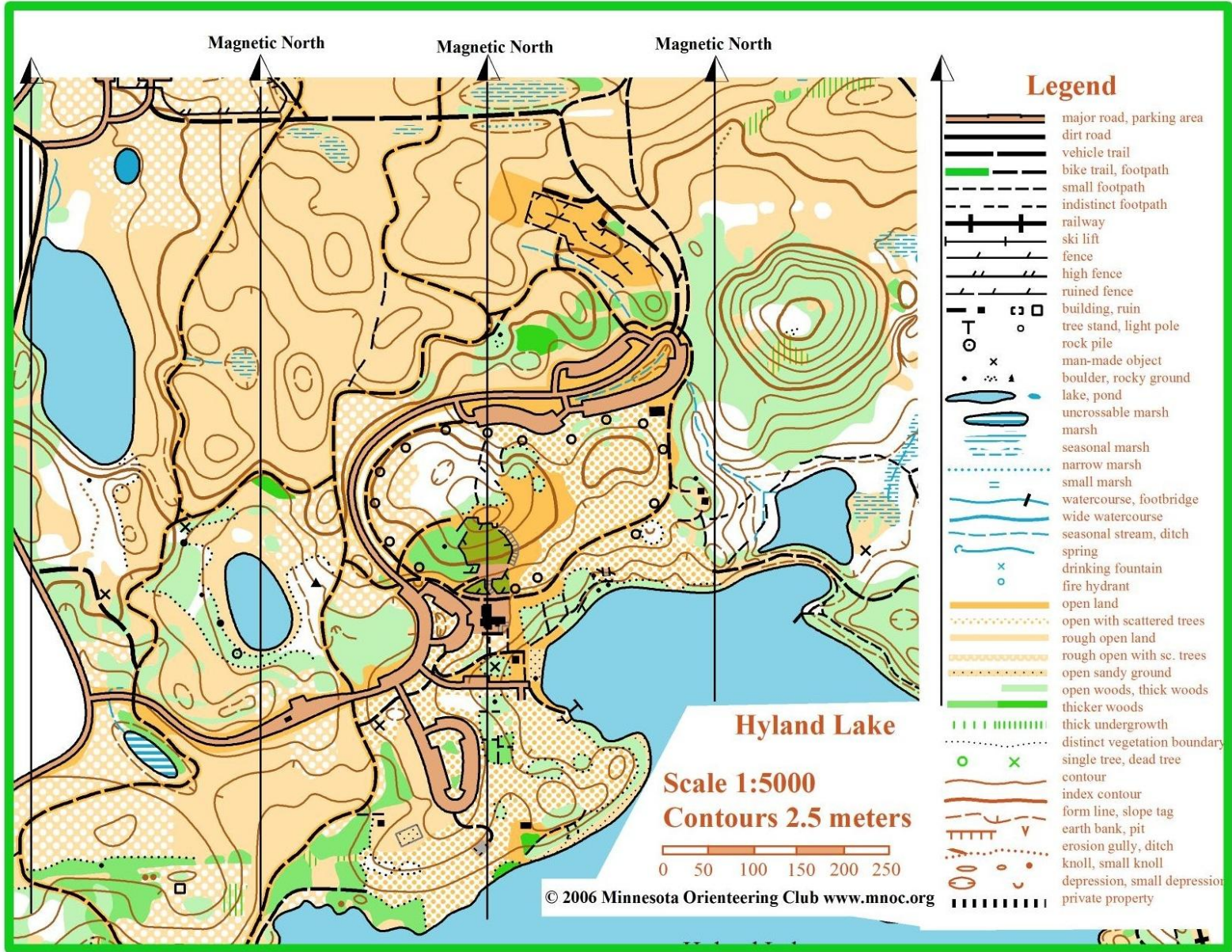
### Scale 1: 10,000 2.5 m contours



# Orienting the map



- Key skill to help you understand the map
- Map is always lined up with the surrounding features
  - Map North to actual North
  - Map feature to actual feature
- Practice w/Hyland map



Magnetic North

Magnetic North

Magnetic North

### Legend

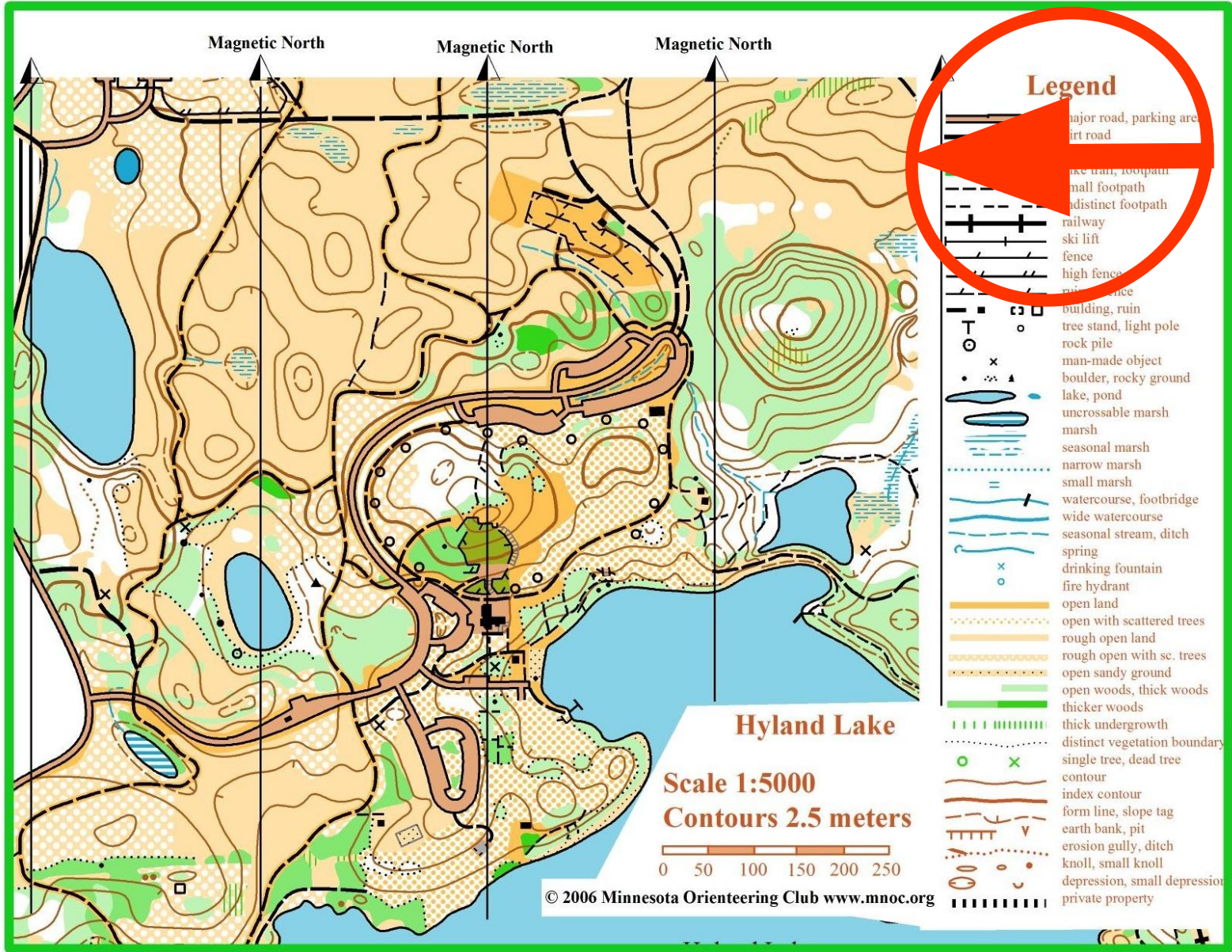
- major road, parking area
- dirt road
- vehicle trail
- bike trail, footpath
- small footpath
- indistinct footpath
- railway
- ski lift
- fence
- high fence
- ruined fence
- building, ruin
- tree stand, light pole
- rock pile
- man-made object
- boulder, rocky ground
- lake, pond
- uncrossable marsh
- marsh
- seasonal marsh
- narrow marsh
- small marsh
- watercourse, footbridge
- wide watercourse
- seasonal stream, ditch
- spring
- drinking fountain
- fire hydrant
- open land
- open with scattered trees
- rough open land
- rough open with sc. trees
- open sandy ground
- open woods, thick woods
- thicker woods
- thick undergrowth
- distinct vegetation boundary
- single tree, dead tree
- contour
- index contour
- form line, slope tag
- earth bank, pit
- erosion gully, ditch
- knoll, small knoll
- depression, small depression
- private property

Hyland Lake

Scale 1:5000  
Contours 2.5 meters



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Magnetic North

Magnetic North

Magnetic North

### Legend

- major road, parking area
- minor road
- lake train, footpath
- small footpath
- distinct footpath
- railway
- ski lift
- fence
- high fence
- building, ruin
- tree stand, light pole
- rock pile
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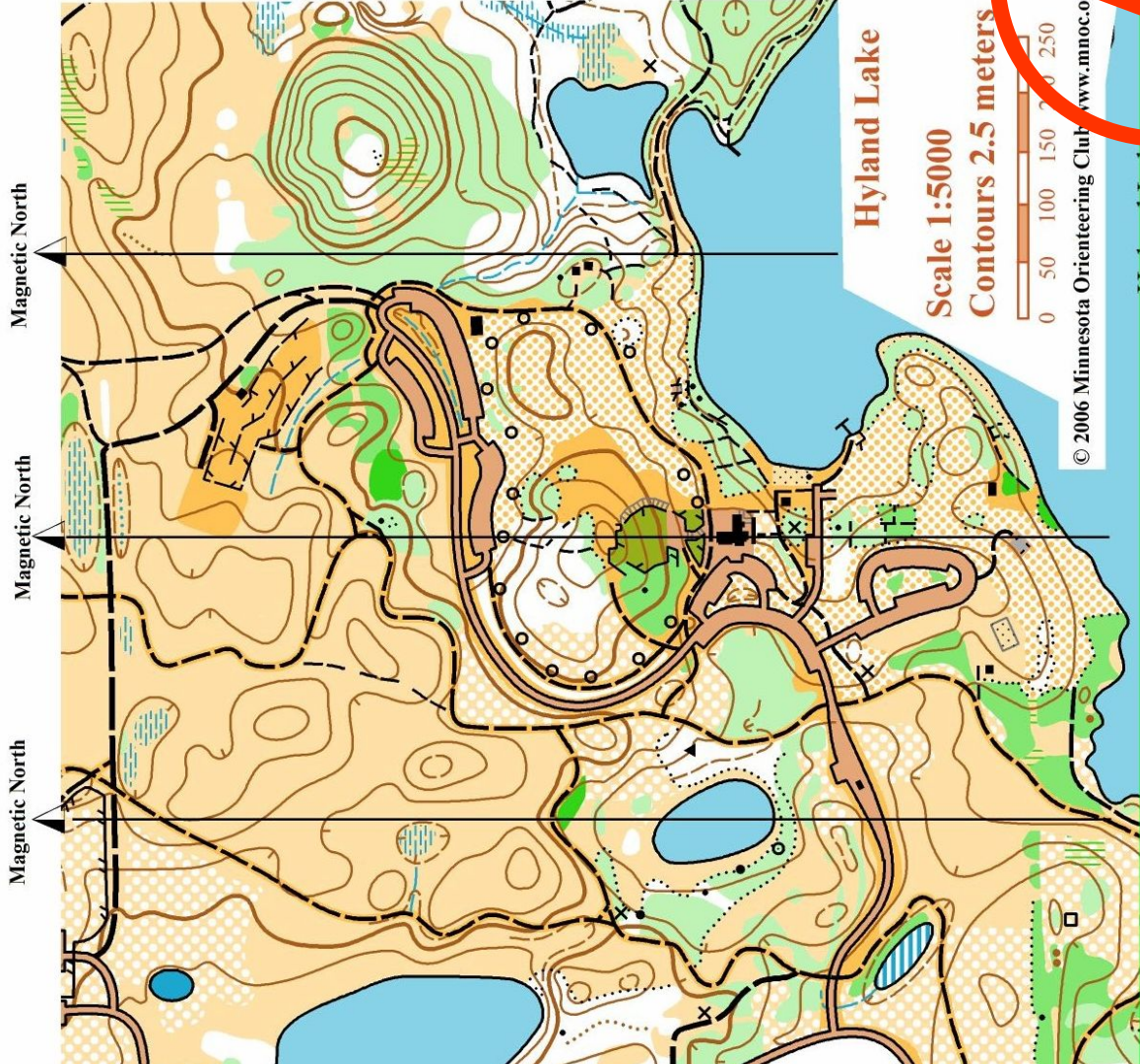
### Hyland Lake

Scale 1:5000

Contours 2.5 meters



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**Legend**

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# **Using the map and orienting it correctly at all times**

- Use the map to move around the park
- Keep the map oriented
- Use your thumb to keep track of your position (“thumbing”)

# Finding Your Way

- Relate terrain you see to the map
- Use compass (as necessary)
- Decide a good route choice (low risk vs high risk)
- Choose features to help you



# Route planning and strategy



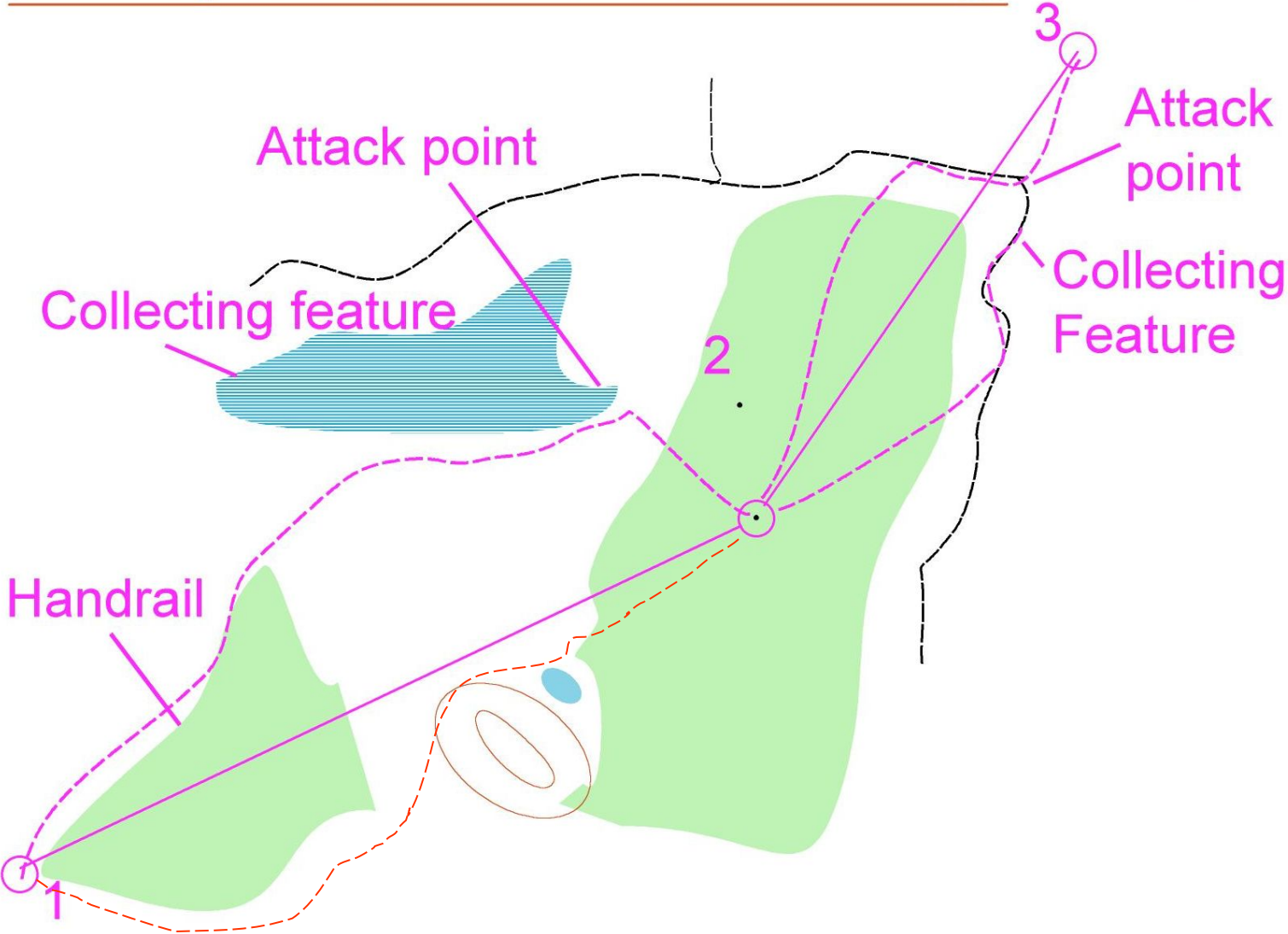
- Manage the risk ... use the features of the terrain to guide you
- Use compass with the map
- Straight line bearing (up and over hills, through swamps, thick vegetation) is NOT the best way



## Attack points, handrails, collecting features

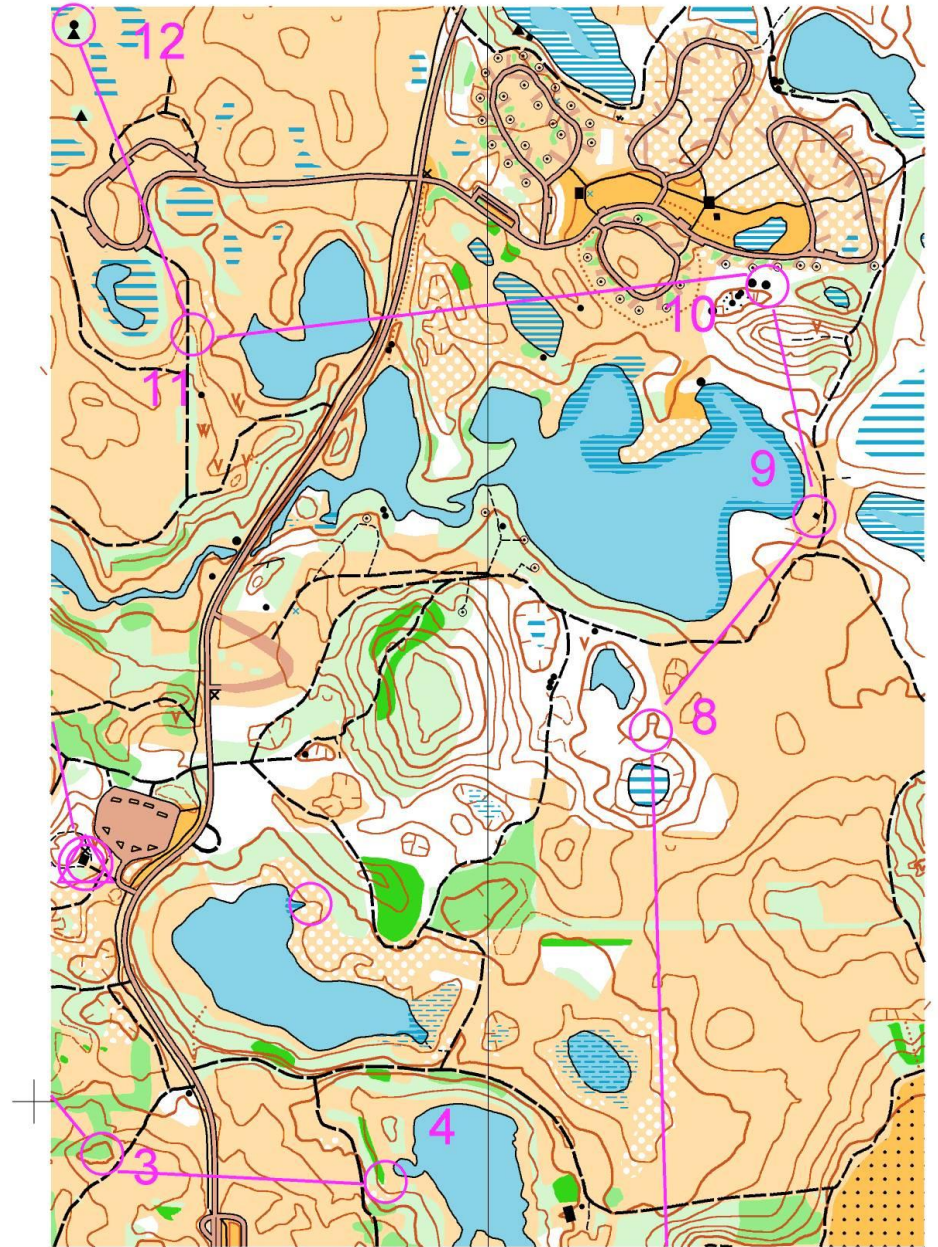


# Attack points, handrails, collecting features



# Route choice tips

- Going straight up and over hills , or through thick vegetation may not be the quickest way
- Use handrail features
- Use attack points
- Use catching features



# MN Orienteering Club



- Meets about every 2 weeks in spring and fall
- About 180 members all ages and abilities
- Permanent courses (Lake Elmo, Tamarack Nature Center, Afton, River Bend)
- Schedule is at [www.mnoc.org](http://www.mnoc.org)
- Membership of \$16/ year (individual), \$22 family, \$50 (group) - reduced fee at meets, members only meets.

# MNOC Schedule

## Spring/Summer 2023



We are offering a full complement of Orienteering in 2023.

There is always a skill level variant at our meets.

We are always willing to share tips, talk through your experience, and socialize with outdoor oriented people.

<p><b>Skills Clinic at French Regional Park</b>  <b>Saturday, April 29, 2023</b>  <a href="#">Learn more and register</a>  <i>Skills Clinic</i></p>	<p><b>Lake Maria State Park</b>  <b>Sunday, May 14, 2023</b>  <a href="#">Learn more and register</a>  <i>Regular Meet</i></p>	<p><b>Afton State Park</b>  <b>Sunday, May 21, 2023</b>  <a href="#">Learn More and Register</a>  <i>Regular Meet</i></p>
<p><b>Battle Creek Regional Park, Adventure Run</b>  <b>Thursday, June 8, 2023</b>  <a href="#">Learn more and register</a>  <i>Adventure Run</i></p>	<p><b>Tamarack, Adventure Run</b>  <b>Thursday, June 15, 2023</b>  <a href="#">Learn more and register</a>  <i>Adventure Run</i></p>	<p><b>Beards Plaisance Picnic/Annual Meeting</b>  <b>Thursday, June 29, 2023</b>  <a href="#">Learn more and register</a>  <i>Annual Meeting</i></p>
<p><b>Location TBD, Adventure-O</b>  <b>Saturday, July 8, 2023</b>            More information coming  <i>Adventure-O</i></p>	<p><b>Riverbend Nature Center Bike-O</b>  <b>Sunday, August 6, 2023</b>            More information coming  <i>Mountain Bike-O</i></p>	<p><b>Como Regional Park, Adventure Run</b>  <b>Thursday, August 17, 2023</b>  <a href="#">Learn more and register</a>  <i>Adventure Run</i></p>
<p><b>Interstate State Park</b>  <b>Sunday, September 24, 2023</b>  <a href="#">Learn more and register</a>  <i>Regular Meet</i></p>	<p><b>Mille Lacs Kathio State Park</b>  <b>Saturday, October 7, 2023</b>  <a href="#">Learn more and register</a>  <i>Regular Meet</i></p>	<p><b>Sever's Corn Maze-O</b>  <b>Sunday, October 15, 2023</b>  <a href="#">Learn more and register</a>  <i>Corn Maze-O</i></p>
<p><b>Lake Elmo Park Reserve</b>  <b>Sunday, October 22, 2023</b>  <a href="#">Learn more and register</a>  <i>Regular Meet</i></p>	<p><b>Theodore Wirth Veteran's Night-O</b>  <b>Saturday, November 11, 2023</b>  <a href="#">Learn more and register</a>  <i>Night-O</i></p>	<p><b>PAST EVENTS</b>            Archived events below.</p>

# MNOC French RP Skills Clinic

- White Guided Course
- Yellow on your own (Route Planning Advice available)
- Orange Sprint course with e-punch
- Maze

# Audience Background



- How many people have ever been orienteering and/or adventure racing before?
- How many know how to use a protractor or orienteering compass?
- How many are here who are youth group leaders/ teachers ?

# Orienteering

- A multidimensional craft honed by practice and experience
- learning to read the terrain
- using a map and compass
- planning a good route
- implementing that route
- **CUNNING RUNNING/BIKING  
CANOEING/SNOWSHOEING/  
SKIING .....the thinking sport**

