

## SECTION IV FISHING EQUIPMENT

### 22. RODS

- a. **Rod selection.** The type of water, bank conditions, and fish species sought are guides in selecting the kind and length of rod. Weed belts along the water edge and steep banks call for a longer rod; a shorter rod is more practical when fishing from shore areas free of aquatic plants, when wading or fishing from a boat, or when casting from banks covered by heavy vegetation. The type of fish sought, however, is a more important consideration than natural conditions. The species' fighting abilities and the extent of battle expected will determine the type of rod needed. A sheatfish, for example, may weigh more than 100 pounds in the Danube watershed and can be controlled only by a long and stiff rod. The fierce strike and acrobatics of a salmon can take 50 or more yards off the reel in one tug and require a very long and sturdy, yet flexible, rod. Minnows or other small fish generally are taken best with very light and short rods. As a rule, the carp, a tough fighter, requires a rod neither too light nor too short. A rod that is light and flexible, but not too short, is ideal for small-mouth grayling and whitefish. Spin-casting for pike calls for a medium weight, fairly stiff rod. Careful consideration of both natural conditions and species' fighting behavior when selecting a rod maximizes the thrill of fighting a hooked fish and ensures its safe capture.
- b. **Rod Construction:**
  - FIBERGLASS ROD (Full or hollow)
  - GRAPHITE ROD (Full or hollow)
  - KEVLAR WRAPPED ROD
  - BAMBOO (split-cane of six strips glued together under heavy pressure, heat-treated and coated with lacquer for waterproof. Ideal for Fly-Fishing)
- c. **Types of Rods**
  - Bait Casting
  - Spin Casting
  - Fly Rods
- d. **Rod Action**
  - Tip Action
  - Half Parabolic Action
  - Parabolic Action
- e. **Reel Seat**
  - Adjustable
  - Fixed

f. **Rod Handle**

- Material
- Types

**23. Reels**

a. **Types of Reels**

- Bait Casting
- Spin Casting
- Spinning
- Fly

**24. Reel Spool**

**25. Reel Drag**

**26. Important Points for Reels**

**27. Lines, Leaders and Knots**

a. **Lines**

- Monofilament
- Multifilament
- Fly lines (floating/sinking)

b. **Leaders**

- Synthetic
- Wire material

c. **Knots**

- Double Overhand Knot
- Improved Clinch Knot
- Blood or Barrel Knot
- Nail Knot

**28. LURES AND BAITES**

a. Any bait is actually a lure, and vice versa. Bait and lure fishing are different, however. The term bait should be limited to any natural food used in baiting a hook, and the term lure should be applied to any artificial lure attached to the line.

b. **Types**

- Spoon
- Spinner
- Plug
- Fly
- Jigs
- Wobbler

**29. HOOKS**

**30. ACCESSORIES**

- Essential Accessories
- Beneficial Accessories

# FISHING-EQUIPMENT

## 1. Fishing-rods:

**main functions:** controlled long distance casts  
safe landing of the fish

### Varieties of rods:

#### fiberglass-rods:

robust, cheap, very heavy, antique method, only used for trolling

#### hollow-fiberglass-rods:

light and flexible

telescopic rods: short transport length, good for traveling

2 to 5 piece rods: longer transport length, better action

#### carbon-fiber rods:

telescopic or 2-5-piece-rods

light and powerful (state of the art)

expensive

#### slit-cane-rods:

6 long lengths of bamboo glued together

flexible, but powerful

very expensive

traditional fishing equipment (mainly for Flyfishing)

### Different rods for fishing

Bait-casting rods: fishing with bait (float, lead)

Spinning rods: fishing with artificial lures

Fly rods: flyfishing (one hand rod 1,8 m – 2,7 m; two hand rod over 2,7 m)

Trolling rods: trolling from the boat with lures in different depths

Dip-fishing rods: ultra light extra long rod for float fishing for coarse fish

**Casting-weight** (in USA, line class in pound)

from 5 gr. to 500 gr.

**Rod-action:**

tip-action  
 progressive action  
 parabolic action

**Casting techniques:**

overhead-cast  
 side-cast  
 pendulum (swing)-cast  
 false-casting (flyfishing)  
 roll-cast (flyfishing)  
 double-hall (flyfishing)

**Line class:**

fly-rods:	Aftma:	1 – 13	
ultra-light-rods	casting-weight	2 – 15 gr.	( 2 – 6 lb.)
trout-rods	casting-weight	10 – 30 gr.	( 4 – 10 lb.)
medium spinning-rods	casting-weight	30 – 60 gr.	( 6 – 15 lb.)
strong rods for pike	casting-weight	40 – 80 gr.	(15 – 40 lb.)
strong rods for Taimen	casting-weight	100 – 250 gr.	(25 – 60 lb.)

**Floats:**

strike indicator, holding the bait in different depths

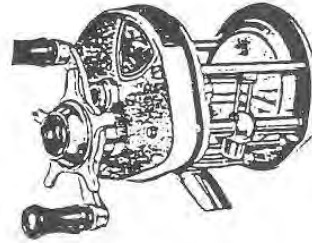
**2. Fishing-methods**

	rod-length	reel	line	fish
bottom fishing	<b>1 foot = 0,305 m</b>			
light	2,10 – 3,90 m	light	0,20 – 0,25 mm	small coarse fish
medium	2,70 – 3,60 m	intermediate	0,25 – 0,30 mm	med. coarse fish
strong	2,40 – 3,30 m	heavy	0,35 – 0,40 mm	eel, ling-cod
float fishing				
light	2,70 – 4,90 m	light	0,16 – 0,20 mm	small coarse fish
medium	2,70 – 3,50 m	intermediate	0,23 – 0,27 mm	med. coarse fish
strong	2,70 – 3,50 m	heavy	0,27 – 0,35 mm	big coarse fish
spinfishing				
light	2,10 – 3,00 m	light	0,20 – 0,23 mm	trout, perch
medium	2,40 – 3,00 m	intermediate	0,25 – 0,30 mm	walleye, trout
strong	2,40 – 3,30 m	heavy	0,30 – 0,35 mm	pike
super-strong	2,40 – 3,30 m	heavy	0,50 mm	Taimen

### 3. Reels

#### Spinning-reels:

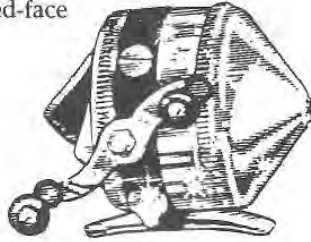
common reel in Europe



#### Conventional-reel (bait-casting-/trolling-reel):

common for spin-fishing and trolling in USA

Closed-face



Closed-face-reels:  
oldfashioned

#### Fly-reel:

reel for flyfishing

(gear ratio or direct drive)



### 4. Fishing-line:

(in different colors and qualities)

- monofilament
- Dacron (braided line)
- Dyneema-line (braided line); best quality
- Flyline (floating or sinking); Dacron coated with plastic

#### average line-strength:

monofilament		Dacron		Dyneema	
0,20 mm	4,0 kg	0,42 mm	9,0 kg (20 lbs.)	0,20 mm	14,0 kg
0,25 mm	5,9 kg	0,50 mm	13,5 kg (30 lbs.)	0,26 mm	15,0 kg
0,30 mm	7,9 kg	0,60 mm	22,0 kg (50 lbs.)	0,30 mm	21,0 kg
0,40 mm	12,6 kg	0,70 mm	36,0 kg (80 lbs.)	0,40 mm	30,0 kg
0,50 mm	19,3 kg	0,85 mm	59,0 kg (130 lbs.)	0,50 mm	46,0 kg

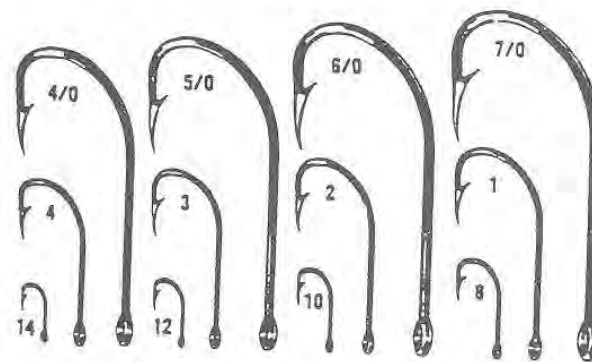
the weakest point in your line is always the knot !!!!!!!

The strength of the line should be as strong as possible (to reduce the risk of losing a fish by breaking the line), and not thinner than necessary,

Between your main line and the hook should always be a section of leader (30 cm – 2 m), which is slightly weaker than your main line, to avoid unnecessary line loss.

Hook-sizes (Robert Rasp):

Fish	single-hook	triple-hook	Fish	single-hook
europ. catfish	2/0 – 10/0	1/0 – 4/0	Perch	1 – 4
Pike	2 – 3/0	2 – 3/0	Carp	1 – 4
ling-cod, eel	1 – 4	–	Tench	4 – 8
walleye	1 – 4	–	Grayling	8 – 16
sucker	1 – 4	–	bream	8 – 16
chub	1 – 6	–	whitefish	10 – 20
trout	6 – 18	–	baitfish	10 – 20
taimen	4/0 – 10/0	1/0 – 4/0		



Comparative hook sizes

the smallest hook is size 32  
 medium size is around 1  
 oversize ends with ..0, (1/0)

The size of the hook should be as big as possible, otherwise a undersize fish might swallow the bait and the hook cannot be removed properly from the fishes mouth without injuring it severely.

The fairest way of fishing is fishing with the single berbeless hook (Jemison Hook)

### 5. Landing of the Fish and special tackle:

The size of your landing equipment should be adequate to the size of the expected fish.

small landing net for average fish

large landing net for Spinfishing

Gaff for Pike, Taimen and European Catfish (the gaff should only go trough the jaw)



When fishing, always have your governmental-fishing-license, the days-permit, a measure-tape, a pair of tweezers, a fish-bonker, a knife and a landing-net with you.

## 6. bait and lures:

### natural Bait:

corn, beans, boilies, march mellows, bread worms, maggots, *dead* fish

### artificial lures:

Jigs (C-tailgrub)

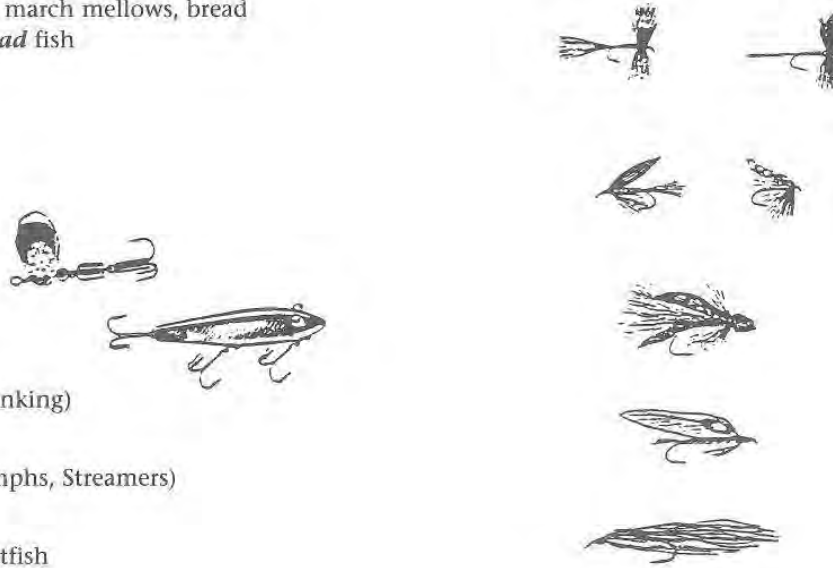
Spoons (metal)

Spinners (metal)

Plugs (swimming, sinking)

Flies (Dry-Flies, Nymphs, Streamers)

Rig-ups for dead baitfish



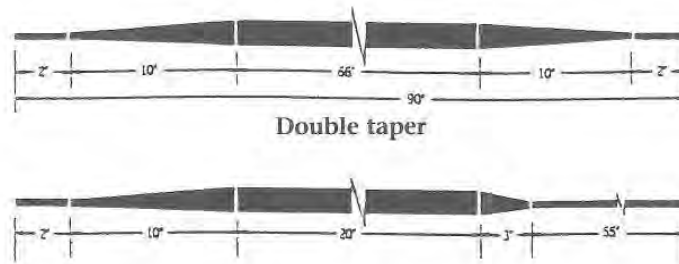
## 7. Flylines:

DT (double taper): for precise short- and medium-distance casts

WF (weight forward): for fast and long distance cast

L (level)

ST (shooting taper): for fast casts with big Flies against strong wind



On the Flyreel you should always have at least 50 m of backing (dacron) before you put the Flyline on, on the tip of the Flyline you add your selected leader.

Aftma 1 – 3	ultralight	dry-fly-fishing (small trout)
Aftma 3 – 6	medium	dry-fly-fishing (trout, grayling)
Aftma 6 – 8	medium	nymph or streamer-fishing (trout)
Aftma 8 – 12	heavy	wet-fly and streamer-fishing (salmon, tarpon, pike, steelhead)

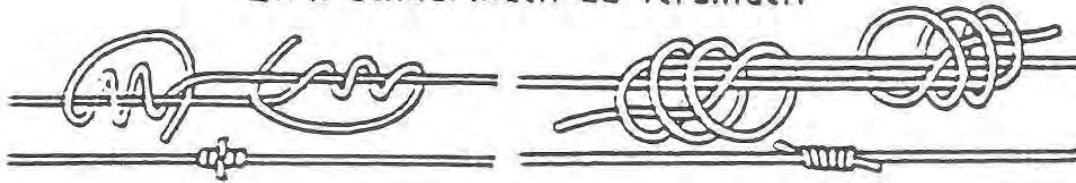
## 8. Knots

A great resource for fishing knots is available on the internet:

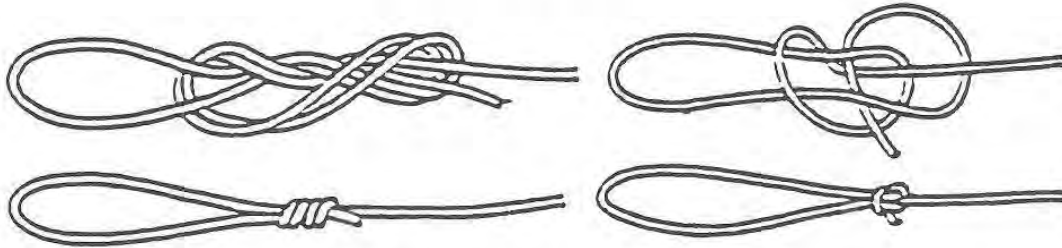
<http://www.animatedknots.com>

(example on page 18 G)

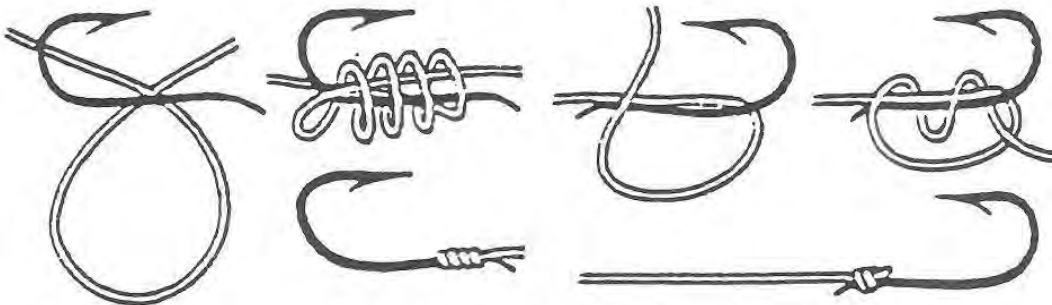
*Zwei Schnurenden zu verbinden*



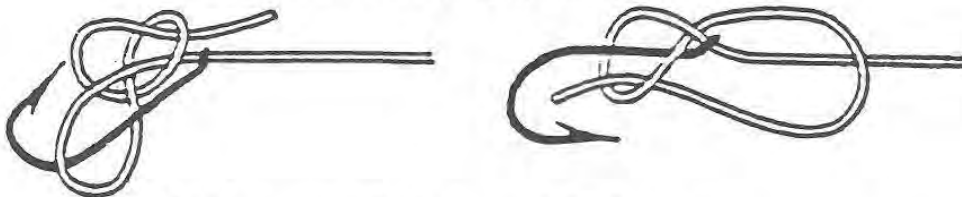
*Schlaufenknoten*



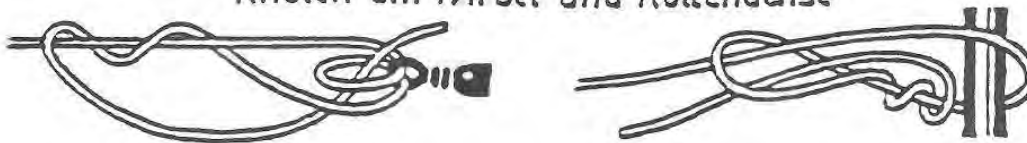
*Anbinden von Platten-Haken*



*Anbinden von Öhr-Haken*



*Knoten am Wirbel und Rollenachse*





A great resource for fishing knots, available on the internet:

<http://www.animatedknots.com>



## ANIMATED KNOTS BY GROG™



### Grog's Index of Fishing Knots



- Fishing Index**
- Fishing Uses
  - Albright Knot
  - Arbor Knot
  - Blood Knot
  - Dropper Loop
  - Improved Clinch
  - Nail Knot
  - Palomar Knot
  - Perfection Loop
  - Rapala Knot
  - Snell Knot
  - Surgeon's Knot
  - Surgeon's Loop
  - Trilene Knot
  - Uni Knot


**Instructions:** Move the mouse over each knot. Look at the description to find out what it can be used for. Click on the knot you wish to see. On the new page wait until the selected knot starts to tie itself.



#### Welcome to Fishing Knots

These animated knots are primarily used for fishing, but some are useful in other applications. Select the knots from the index above or from the [Fishing Uses](#) page.

The selection of knots is based on feedback and advice from many expert fishing contributors to this website. Click on the picture on the right to see an enlargement.



#### Fishing Knot Characteristics:



Fishing knots are designed to be tied in monofilament line and to run through the eyes and rings of a fishing rod or rig. Fishing line is cheap. The emphasis, therefore, is on **compactness and reliability** with **no interest in being able to untie** them.

#### Fly Fishing Knots:

The picture on the left shows one typical system for fly fishing. It shows examples of knots that can be used at each junction. The

### **31. MANDATORY ITEMS FOR A FISHER TO KEEP WITH HIM WHILE FISHING**

- FISHING LICENSE
- FISHING PERMIT
- CATCH BOOK
- MEASURING TAPE
- CLUB
- HOOK REMOVER
- KNIFE
- WEIGHTING DEVICE

In addition it is advisable to carry a First Aid Kit!

### **32. GENERAL TERMINOLOGY**

- a. Sportsmanship is conduct becoming to a sportsman, involving honest rivalry, courteous relations, and graceful acceptance of results. The term sportsmanship applied to fishing conveys much more than the enjoyment of taking fish. It includes an active interest and desire to help in conservation. Inherent in sportsmanship are high ideals, love of the outdoors, and kindness to all creatures.
- b. The German fishermen's greeting or good luck wish is "PETRI HEIL". "PETRI DANK" is appropriate reply of a fisherman in any situation when one would say "thanks".

### **33. CODE OF CONDUCT**

The privilege of enjoying the honorable sport of fishing carries with it serious responsibilities that a true sportsman will not ignore. The sporting fisherman will:

- a. Obey the game laws.
- b. Use proper and safe equipment for the species sought.
- c. Respect the rights of property owners.
- d. Extend courtesy to fellow fishermen.
- e. Keep the fishing area free of litter.
- f. Avoid unnecessary pain to all creatures.
- g. Select a hook no smaller than absolutely necessary.
- h. Give assembled fishing tackle a final check to detect deficiencies before the first cast.
- i. never use stringers.

### **34. PROPER TREATMENT OF KEEPERS**

- a. After hooking and landing a fish, conscientious sportsmen will determine immediately if he can present his quarry with a clear conscience to a game warden who suddenly appears for inspection.
- b. Quarry that does not meet the legal requirements (for example, a fish half an inch too short, or caught on the first or last day of the season) should be returned gently to the waters without hesitation.
- c. What happens to a fish that meets the legal requirement of length and is caught in season? It is shocking to observe the few fishermen who disregard the basic fundamentals of sportsmanship. Cruelties toward defenseless, dumb creatures are manifold and occasionally unbelievable. Hooks are torn from the mouths of so-called coarse or trash fish, which are then thrown on the ground to perish and decay, leaving an unpleasant sight and odor.

- d. German laws require that fish meant for human consumption be killed instantly and as painlessly as possible. Instantly means properly killing fish taken out of their environment. Stringers are illegal.
- e. Fish must be stunned before gutting. The proper methods for stunning and killing fish differ with the species. A small club or similar object is an excellent tool for stunning. Sympathy and mercy are always present in the true sportsman.