KAYAKING

TIPS ON STARTING A FULFILLING

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A FULFILLING NEW HOBBY

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INTRODUCTION

Kayaks can be defined as a boat which can be paddled from a seated position with two paddles. It is a decked boat in contrast to the canoe which is a non decked boat and has to be paddle from a kneeling position with a single paddle.

Being human powered, the Kayak is covered by a spray deck. The paddles are double bladed.

Kayaking is using the Kayak to move on the water. The difference between the Kayak and the Canoe is the cockpit. While the kayak has a closed cockpit, the canoe has an open one.

There is a seat at the bottom of the boat where the kayakers sit with their legs stretched out in front. On a canoe, there is a bench which is slightly raised where the canoeist has to kneel down.

Kayaking as a hobby is gaining tremendously in popularity. With lifestyle becoming more and more stressful, a lot of people are taking to kayaking on weekends which is a wonderful way to enjoy with family and friends.

This book gives you detailed information about the various types of kayaks, techniques to use them, tips on purchasing a kayak, etc. If kayaking is already your hobby or you are planning to take it up as a hobby then go on....happy reading and happy kayaking!!!

HISTORY OF KAYAKING –

Meaning of the word kayak is “man’s boat” or the “hunter’s boat”. According to archaeological evidence, kayaks are as old as 4000 years. Building a kayak originally was a very personal affair. The person who wanted the kayak had to construct it on his own maybe with the assistance of his family.

His wife especially helped him sew the skins and helped him fit everything to measurement making sure there was enough room for manoeuvrability. They then used to make a skin jacket called a Tuilik – the original form of the modern spraydeck, which being attached to the kayak acted as a waterproof seal.

The way the original kayaks were built is very interesting. The first kayaks were built according to the size and structure of the person using it. There was no particular set standard for the size of the kayak or the material used to build it.

The builder of the kayak used the materials that were available with him and used approximate measurements adjusting the same with his body structure as reference.

They used some standards like the length of the kayak should be three times the length of the user’s hands when he stretches out. Width of the cockpit measured the width of the builder’s hips plus two fists and the depth was approximately two of his
fists added to the outstretched thumb.

When you work this out, you see that the original kayaks approximately measured around 17 feet in length, 20 to 22 feet in width and about 7 inches in depth. Every kayak was therefore unique and custom made and very difficult to duplicate.

Thousands of years back, the indigenous people living in the Arctic regions used boats to hunt for fish for their livelihood. They used to go on boats and fish in the rivers, inland lakes and the coastal waters of the Arctic Ocean, Bering Sea, North Atlantic and the North Pacific oceans.

These were the people who invented the original form of the kayaks. They did this by using the skin of animals like the seal. Since a lot of the areas where they lived did not have any trees, they used to collect driftwood, make frames out of these and stretched the seal skin over the frame to give body to their kayaks.

Kayak is a broad term used these days for this type of boats. Originally the native people had different names for boats used for different purposes.

A type of boat which was made in double or triple cockpit designs was used for transporting passengers, goods and also for hunting. This boat was referred to as the Baidarka.

Another type of a boat which was anywhere between 17 to 60 feet long was open decked. This boat was constructed using the driftwood frames and seal skins. The paddles were single bladed and more than one person used to paddle the boat. This boat was called the Umiak which means “Women’s Boat”. The kayak probably was an Umiak which was decked and evolved into the modern day form over a period of time.

Kayaks of today basically originated from the primitive boats of Alaska, North Canada and Southwest Greenland. Till the 1950s, wooden kayaks and the folding kayaks which is the kayak made out of fabric fitted on wooden frames which are foldable were popular.

The year 1950 saw the introduction of the kayaks made of fibreglass. Using rotomolded plastic to make kayaks is in vogue even today and this originated in the year 1973.

Today kayaking is more of an entertaining hobby pursued by a lot of people. The stress of modern life leads people towards kayaking where they can let go and play around with the forces of nature and return back fresh to face life.

Apart from being a popular hobby, kayaking is also becoming popular as a competitive sport.

DESIGNS OF CONTEMPORARY KAYAKS –

There are three important factors which are taken into consideration while constructing a kayak. They are the manoeuvrability or the directional stability, primary and secondary stability and the overall lateral stability and speed. Following are some of the factors which affect the design of the kayak -

LENGTH OF THE KAYAK -

The length of the kayak is a very important factor. While a longer kayak is faster the smaller ones are easily manoeuvrable. But the speed of the longer kayaks is restricted to an extent by the friction that is created.

Kayaks used for touring and the sea kayaks are between 16 and 19 feet long. The whitewater kayaks are built shorter to enable for easy manoeuvrability as they are mainly used in rivers and depend on the river currents for their motion.

Boats which require more manoeuvrability than speed thus are much shorter actually not more than eight feet. Specialized boats such as the play boats are just six feet long.

The recreational kayaks are generally between nine and fourteen feet. This is because they are designed as a compromise between tracking and manoeuvrability. They have the additional requirement of keeping their costs down for obvious reasons.

ROCKER -

The second factor that has to be taken into consideration while designing a kayak is the rocker. Rocker is the measure of the curvature of the kayak from the bow to the stem. A heavily rockered boat is less in contact with the water surface and a boat which is rockered less is more in contact with the water surface. If the rocker is moderate it makes it easy for handling the kayak.

Kayaks which are less rockered are usually fast and the ones which are more rockered are flexible and manoeuvrable. For example, even though a whitewater kayak is not very much shorter than the recreational kayak, it is more manoeuvrable due to the fact that it is heavily rockered. The waterline is thus much shorter in this kayak.

The next important factor in kayak construction is the design of the hull. Design of the hull depends on two factors. One is the shape of the bow to the stem and the other is the shape of the hull in cross section.

The bow to stem can be of different shapes –

- Symmetrical in which the widest part of the kayak is exactly midway between the bow and the stem.
- The fish form in which the widest part of the kayak is a little forward at the midpoint.
- The Swede form is the one in which the widest part is at the back of the midpoint.

THE V BOTTOM –

The V bottom is another feature which affects the movement of the kayak. V bottom is the feature which affects the tracking and manoeuvrability of the kayak. Presence of a V actually enables the kayak to travel in a straight line or track but reduces flexibility.

Factors that affect the hull shape include the degree of roundness at the bottom, presence of V at various points on the hull, presence or absence of a chine or even how severe the chine is – chine is where the side of the hull and the bottom of the hull meet at an angle forming an edge below the gunwales.

The design of the hull is thus a major factor which determines the stability of the kayak and the resistance of the boat to tipping and capsizing.

STABILITY –

Flat bottomed kayaks have more primary stability and are good for beginners, while the round bottomed ones have lower primary or initial stability and more secondary stability.

Though flat bottomed kayaks are preferred by the beginners, they are not very safe as they capsize very fast when they begin to tip. Round bottomed kayaks are more stable as they present more cross section to the water when they are tipped from the level.

The sea kayaks thus have more secondary stability as they have to ply in challenging conditions. The recreational kayaks on the other hand with their flat hull shape have more primary stability.

The white water kayaks now have flatter hulls to allow them to just sit on top of the water rather than be in the water.

DESIGN OF THE COCKPIT –

Kayaks in the olden days had a cockpit covering a larger area but the materials used were not water proof enough to cover the same. This fact led to the designing of more compact decks which encased the rider.

Eventually, as this was quite uncomfortable and difficult for the paddler to get out quickly, the modern kayaks emerged with the “Key-Hole” deck design. This is a cockpit which is elongated and large and is shaped like a key hole. This is easier for the paddler to get out in the vertical pin situation and is quite compact due to the neoprene spray decks.

CONSTRUCTION OF THE KAYAK –

Initially the kayaks were designed with wood or foam models which are called the plugs. This design is cut out and modified until the desired form is arrived at. It is then sanded down and smoothed off.

The next step involved the making of a mould or a cast from this original and this is then used to construct the further versions.

Modern kayaks are designed with several prototypes and plug designs leading to the final kayak for testing which is then refined and produced.

MATERIALS USED FOR KAYAKS –

Fibreglass –

Fibreglass is a material which is strong and light and it is very easy to use. They are also flexible enough to be moulded to the desired shape. Maintenance of the fibreglass kayak is also easy as they can be easily repaired with the use of a resin kit.

The first step in the construction of the fibreglass kayak involved making a mould. Layers of fibreglass are then pasted to the inside of this thick two part mould. After it is set, the mould is split to leave the complete shell or the hull of the kayak.

Now a day's fibreglass is used only in the Slalom Kayaks due to the light weight of the material.

Rotomoulded Plastic –

Plastic bases which are made using a process called rotation moulding is used in most of the modern kayaks. The process involves using plastic dust which is spun in a biaxial rotation mould at low pressure and high temperature. Biaxial rotation mould is one which is spun through two axis.

The rotomould uses aluminium as it is sturdier and is a good conductor of heat. Though this is the most efficient way of producing high quality plastic boats, the production cost is very high.

There are certain advantages of using plastic than the fibreglass. Plastic is more resistant to impact as it is ductile.

MODERN KAYAKS –

Modern kayaks are of many specialized types like the sea kayaks, whitewater or river kayaks, surf kayaks, racing kayaks, etc.

Classification is based on what the kayak is used for like the whitewater, surf, touring/expedition, light touring/day tripping and general recreation. There are many sub classes under these primary classifications.

SEA KAYAKS –

Sea kayak is also popularly known as the touring kayak or the ocean kayak. This kayak is designed for paddling on open waters like bays, oceans and even lakes. Sea kayaks have a covered deck and sometimes even a spraydeck. They compromise manoeuvrability for cargo space, straight line paddling and long journey comforts.

Sea kayaks are popularly used for marine journeys lasting anywhere between a few hours to weeks. They are large enough to accommodate two paddlers plus their camping gear, water, food and other supplies.

Distinct features of the sea kayaks include a longer waterline to assist in straight travel and storage space on the lower deck for cargo. For specialized straight line tracking, sea kayaks have rudders of skegs.

Other features include stern profiles and an upturned bow for wave shedding, internal bulkheads numbering two or more for watertight internal sections enabling flotation and storage which is water proof.

Origin of Sea Kayaking –

Origin of sea kayaks dates back to the native boats of Alaska, Canada and Greenland. These kayaks were made of wood and fabric till the 1950s. sea kayaks of today are made with the rotomoulded plastic which first came into existence in the year 1984.

DESIGN OF THE SEA KAYAK –

Sea kayaks can be mainly discriminated by two types – the folding kayaks and the rigid kayaks. They come in a variety of materials, designs and sizes depending on what it is used for.

The recreational kayaks are shorter and have wider beams and larger decks.

The sit-on-top kayaks are rotomoulded and their cockpits are enclosed.

The inflatable kayaks have quite a rigid frame with sponsons which are inflatable.

The surf skis are narrow and long and are used for Open Ocean racing purposes.

Sea kayaks are generally between twelve feet and twenty four feet long. The larger kayaks can accommodate two paddlers or sometimes even three.

Specialized boats are quite narrow but in general all sea kayaks are about 18 to 28 inches wide. The length of the kayak is determined by the amount of cargo which has to be carried in it and also the tracking ability required which is the ease with which the boat travels in a straight line.

The longer the kayak the straighter you can paddle it. It is harder to turn. The width of the kayak determines the stability of the boat.

Shown above is a picture of a sea kayak made out of epoxy, fibreglass and plywood.

Fibreglass, rotomolded polyethylene or Carbon Kevlar are some of the materials used for production of rigid production. There are more exotic materials which are also used in production of the kayaks such as carbon fiber and foam core.

Kayaks constructed using skin on a frame is built either on wood or aluminium. This is then covered with fabrics like canvas, Dacron, etc and also include sponsons which are inflatable tubes.

DECK, STEM AND BOW DESIGNS –

Bow are upturned in some kayaks to facilitate better performance in the wave and better ability to shed waves. There are other kayaks which try to achieve this with increased buoyancy in the bow.

Kayaks in which the stern is not obstructed eases self rescue of certain kinds. Modern kayaks provide flotation in case of capsize as they have waterproof bulkheads.

Decks of the sea kayaks also have hatches in order to access the storage space easily.

Sea kayaks have tracking aids or steering gear like rudders and skegs. Rudders are usually attached to the stern. They are operated using the foot pedals which are present in the cockpit via wires.

When there is a strong wind coming from other than the front, the paddler is then assisted by the sterns and skegs.

PADDLES FOR SEA KAYAKS –

There are basically three types of sea kayak paddles –

The European styled paddles have two blades which are spoon shaped on two ends of a shaft cylindrical in shape. This type of a paddle assists in accelerating fast and provides flexibility in manoeuvring in whitewater kayaking and is also used in sea kayaking.

The Euro paddles are usually made of expensive materials like carbon fibre so it is light in weight. They are also sometimes made of aluminium, plastic or even wood.
The blades are feathered and set at a right angle to each other.

Greenland paddles have narrow rounded blades which are full near the root of the blade and oval shaped near the tip. Some of the paddles have a “shoulder” which is a sudden transition between the loom and the roots of the blades.

These paddles are not feathered like the euro paddles. The shorter Greenland paddles are called the storm paddles. These by applying a sliding stroke and the hands have to be moved in the direction of the blades for every stroke.

- Storm paddles are usually used only as spares or in locations which are very windy because there is very little outboard to catch the wind.

Wing paddles are shaped like a wing. This paddle is very efficient in enabling the kayaker to produce more motion forward than any other paddle due to the lift produced by the blade while it moves through the water.

The technique of paddling in the wing paddle is not the same as in the European style paddles and the Greenland style. These paddles are mostly used in racing and sometimes also in recreational paddling like touring.

SIZE OF THE SEA KAYAKS –

Sea kayaks comes in different dimensions and designs. The length of a typical sea kayak is between twelve to eighteen feet. Tandem kayaks range between fifteen to twenty feet. Width of a sea kayak is between twenty two and thirty inches.

Touring kayaks which are wider range in width between twenty two and thirty inches. Touring kayaks which are wider between twenty six to thirty inches are used by bigger paddlers or even the smaller or average sized paddlers who are looking more for initial stability and manoeuvrability.

Beams which are narrow provide more speed and lesser manoeuvrability. Such beams are between twenty two to twenty five inches wide and are used more by the small or medium sized paddlers.

Depth of the kayak is usually between thirteen inches to fifteen inches.

Kayaking trips –

Many recreational kayaks operate over the weekend. Overnight camping is also popular among these recreational kayakers. These trips also combine watching wildlife along with kayaking.

The sea kayaks of today can carry a large amount of equipments. These kayaks are used to take people for longer trips of maybe two weeks or more in the arctic and the tropical environments.

SAFE KAYAKING –

The primary factor regarding safety is the paddler himself. The Eskimo roll is considered by some of the kayakers to be a safe open water kayaking. But this can be a little difficult in boats which are heavily laden.

There are a few techniques for righting oneself without assistance and re entering the kayak after a capsize. Many paddlers prefer to paddle with at least one other person as it is easier to climb back into the boat in the open sea with the help of the other boat and paddler.

Experienced paddlers prefer to do it alone though and a lot of these open water expeditions have been carried out by single persons.

It is quite safe to go on your own as there are a lot of safety equipments available. The safety equipments include the compass, towing lines, manual pumps, repair kits like wet application repair tape, flares, spare paddles and survival gear.

Apart from all this, the paddler has to take food supplies, flask of hot coffee. GPS charts. Some people also carry GPS, charts, radios, lights, cell phones and radar reflectors.

WHITEWATER KAYAKS –

Casual whitewater kayaks are usually made using rotomoulds. Material used is a semi rigid and high impact plastic usually the polyethylene. This material ensures that the boat is impact resistant which means even if it bounces off rocks and boulders, it will not suffer leaks. One disadvantage is it tends to fold up on impact trapping the paddler. It also tends to get deeply scratched.

White-water kayaks are usually shorter than the normal kayaks. Their size ranges between five to ten feet. Paddlers prefer shorter boats which is more manoeuvrable but slower. As whitewater paddling is used mainly for recreational purposes and does not require much speed this is just convenient.

When you use this kayak for a freestyle competition, the whitewater kayaks can make use of the complex water movements or rapids to do tricks even as they move up and down a stream along short stretches of the river.

Some kayaks are designed to be paddled both on and below the surface of water. These kayaks are used in Squirt Boating.

Whitewater kayaks which are used for racing are generally made to specific lengths. These are usually longer than the play boats and are made of fibre which is reinforced with resin for maximum speed. They are also lighter and stiffer than the play boat models.

These kayaks require more maintenance especially if handled by inexperienced paddlers. Kayaks which are flat hulled, stable and highly manoeuvrable are called the Slalom Kayaks. These are not very fast especially in a straight line.

The downriver whitewater racers have a hull which is very fast but quite unstable in the lower section. This is similar to a flat water racer's hull which flares out into a wider section as it goes higher.

Whitewater Kayaking is a sport which involves paddling a kayak on a gushing water body like a river or a turbulent white river.

Whitewater kayaking can be a simple, relaxed and carefree gentle movement of the kayak over the water or it can be a dangerous and demanding whitewater. The grading of such river rapids are done based on the extent of danger, difficulty level or severity of the rapid.

White-water grades range from one to six with one being the easiest and six being the toughest. Grade six is actually a very severe and unrunnable whitewater.

SUBCATEGORIES OF WHITEWATER KAYAKING -

River running – this is actually touring down a river enjoying the scenic beauty along with the excitement of experiencing the challenging whitewater. River running trips can be a short one day trip or long multi day trips.

Multiday trips are made along with a river toting raft which carries the cargo to enjoy a more comfortable experience without the burden of a kayak which is heavily laden.

White-water racing competitions are very popular in this category.

CREEKING –

Creeking is a subcategory of River Running. This involves highly technical and difficult rapids in the typical range of Grade/Class four to six range.

Creeking generally means kayaking from a higher gradient. This includes running ledges, waterfalls and slides on smaller and tighter rivers. Sometimes this is also done on relatively larger volume rivers.

Kayaks which are used for creeking have certain features suited to the particular usage. They have higher volume displacement and their bow and stern are more rounded. These features facilitate higher safety margin and protects from pinning.

This craft is also designed in such a way that it resurfaces very quickly while still controlled as they come off larger drops. The rockers in these creek boats are increased or raised on the bow to enable them to cross obstacles and obstructions in the river.

Competitive form of this whitewater kayaking is the extreme racing. This involves the kayakers racing down steep and usually dangerous sections of the whitewater.

PLAYBOATING –

Playboating is a very interesting kind of kayaking. This is freestyle or Rodeo and is more gymnastic and artistic.

It is a category of kayaking wherein the paddler performs various complicated moves in a single spot which is referred to as the playspot. Playboating is thus actually a paddling equivalent of skateboarding or BMX.

This is different from other types of kayaking in the sense while other kayaking involves going from one specified point to the other, play boating is usually performed in one spot in the river. This is usually a pour over or a wave or even a hole where the surfer works with and against the water forces in the river all the time performing various manoeuvours.

The playspots are stationery features like standing waves which may be breaking fully or partially, holes and stoppers where water flows back creating a retentive feature or an eddy line which is the boundary formed between the slow moving water at the edges of the river and the faster water.

Playboaters perform stunts like spinning the boat in all possible directions, vertical moves like cartwheels, loops, blunts, pistol, donkey flips, etc and also surfing. Using the speed and the bounce of the waves, paddlers even perform a lot of aerial tricks.

Playboating is also performed in dynamic moving features like haystacks which are large boils, whirlpools or on flat water which is referred to as flat wheeling. Play spots are generally found on aritificial weirs, artificial whitewater courses, natural whitewater and sometimes on tidal races in the ocean.

Play boaters perform various moves like front and back surfing, spins in various axes like air screws, cartwheels, air loops, stalls with the kayak vertical on both ends, getting airborne or bouncing the boat on a wave or submerging part of the kayak which pops up while re emerging to name a few.

After each move, the play boater usually stays surfing rather than being washed off. Due to the technologically advanced designs and features of the modern boats, play boating has gained immensely in popularity these days.

Modern play boats are made of high quality plastic which is much more robust and sturdy than the ones made of glass fibre or wood. Other features of play boating kayaks include low volume in the bow and stern which enables the paddler to submerge the kayak ends effortlessly.

Play boating competitions are freestyle and are also referred to as rodeo in the United States. Though play boating is mainly done for fun, these competitions are also gaining in popularity. In a set time, the paddlers have to perform as many moves as possible with additional points given for style.

The Park and Play is when you take your car to the bottom of the river in order to play boat. Playboating is considered to be much safer than the Whitewater River running.

SQUIRT BOATING –

Squirt boating started with using low volume boats in order to perform various moves in whitewater. Squirt boating is actually a prerunner to play boating. Design of the squirt boat is low volume throughout. These boats are long and flat.

Play boats are usually custom built to individual weight, inseam and personal preferences; they are made using composite materials instead of plastic. Squirt boat moves include moves which completely submerge the craft and the paddler such as the ‘mystery move’.

In the mystery move, the paddler and the boat are completely submerge in the flow of the river sometimes even for upto half a minute.

BOOFING –

Boofing is one of the techniques of whitewater kayaking whereby the bow of the kayak is raised during freefall or while descending a waterfall. This technique helps the kayak not to fully submerge in the water. This is done by making sure the kayak lands flat when it hits the base of the waterfall.

The term boofing is an onomatopoeia which means it is derived from the sound created when the hull of the kayak makes contact with water at the base of the waterfall.

Perfect boofing requires exact timing. To force the bow of the boat up the final stroke from the waterfall should be powerful enough. Whether you need to boof or not depends on the anatomy of the waterfall. If the base is shallow, you need to boof whereas if the fall is higher than twenty feet boofing should not be done as it may cause injury to your spinal cord.

SURF KAYAKS –

Surf kayaks are also known as “Surf Skis”. They are narrow and long boats which are specialized for surfing purposes, breaking waves and surf zone rescues.

Surf kayaks are usually the racing kayaks which are very fast. The surfer has to be very experienced and should have skill to achieve stability as the hulls are very narrow.

There are traditionally two main varieties of surf kayaking. They are the High Performance or the HP surf kayaks and International Class or the IC surf kayaks.

Features of the HP kayak include lot of nose rocker, little or no tail rocker, flat hulls, sharp rails and upto three fins. These features enable the surfer to generate a lot of speed and he will be able to make dynamic moves.

IC kayaks are at least three metres long and their hull is convex shaped. Surfing on these kayaks is generally smoother and flowing. Materials used for construction of International Kayaks are either tough and heavy plastics or the super light, super stiff but fragile foam cored Kevlar carbon.

Apart from surf kayaks that have a closed cock-pit there is also the open cockpit design called the Waveski. Waveski is similar to surfboards as far as the construction, paddling technique, surfing performance on the waves, etc are concerned. Surf kayaking has become extremely popular these days.

SURF SKI –

The surf ski is a variant of the flatwater racing kayak which is high specialized. It has an open cockpit and is around twenty one feet in length and only eighteen inches wide. Using the surf ski requires expert balance and skill in paddling.

A lot of surf races are held in New Zealand, Australia and South Africa. Surf skis are popular in the United States for lake races, ocean races and downriver races.

Surf skis can be described as a recreational water craft which is light and has a long and narrow displacement type hull. It also has an open cockpit and a rudder which is controlled by a foot pedal. Paddles used are double bladed with wing blades which are contoured for more efficiency.

Wave skis on the other hand are around ten feet or even lesser in length. The bottom of this is planed and there are fns or skegs which are present. These wave skis are similar to the surf boards and are used in surf play.

Surf kayaking is also referred to as “surf canoeing” in the United Kingdom and Ireland.

DESIGN, SIZE AND CONSTRUCTION OF SURF SKIS –

Surf kayaks are typically narrow and long and are about twenty feet log and between sixteen and twenty inches wide. These kayaks are very fast and track well and are not stable and flexible or manoeuvrable.

Surf kayaks or surf skis are made of composite materials like cloth made of carbon fibre, fibreglass or Kevlar. This is bonded with a polyester resin or epoxy. To maintain a light weight of the kayak, the layers of fabric and the resin or epoxy used to bond is kept to a minimum of what is required for structural integrity.

Surf skis are popular mostly in warm coastal regions like Australia, California, Hawaii and South Africa. This is because paddling a surf ski involves contact with water. In cold waters, paddlers prefer to wear a wetsuit.

The hull shape of the long distance racing surf skis are longer and have sharp pointed bows and understern rudders than the lifesaving surfskis. Surfskis are also different from the long distance racing kayaks.

Surf skis are longer and have more longitudinal curvature or rocker. They are also more stable and the wave riding ability is enhanced to a great extent as the surfer sits more towards the centre of the craft.

There are certain things that a long-distance surfski racer should have to ensure smooth and safe surfing. For a start, they must have sufficient volume in the bend, which provides for buoyancy while punching through the surf.

They must also have an extended water-line, which can use the ocean swells, and a sleek and narrow shape will ensure reduced water resistance and enough stability to make paddling possible in rough conditions.

A lot of surf lifesaving competitions are held in countries like New Zealand, Australia and South Africa where the surf skis are used. These surfski racing competitions are managed and conducted by the International Life Saving Federation.

The ILS standard of surfski race is about 700 m from the starting point in water. They usually go around a series of buoys and back to the beach. With more technically advanced crafts, it was not long before the long distance races emerged.

Early races included the 46 km race from Scottsburg to Brighton in South Africa held in the year 1958. Another event which is held once in two years started in the year 1972. This is the 240 km event from PE to East London in South Africa.

The most important event of them all is the Molokai race in Hawaii. This is a 60 km race and was first held in the year 1976. Of late, the long distance surf skiing races have become more popular in USA, Australia, New Zealand and other Pacific countries.

A lot of events are held in these races like the Surfski, Surfrace, Paddelboard, Ski relay, Taplin Relay, Oceanan, etc. These races are held in the ocean, bay, lake or rivers.

If the paddler is tossed into the water a “wet entry” is allowed. The surfer can climb back into his kayak and continue racing without draining the kayak of the water.

Surfskis originated in the 1920s basically in Newcastle Beach, Australia. Originally, the surfskis were designed to paddle out and rescue drowning swimmers. The surfboats were lightweight rowing boats with a crew of five responsible for rescue work in and behind the surf line.

These boats were pretty expensive and required a lot of skill to be used effectively. Over a period of years, the surfskis became narrower to facilitate speed. The narrow width makes it easy for the surfer to cut across big waves.

WOODEN KAYAKS -

Wooden kayaks are those which are constructed using a slender wood enclosed in fibreglass. This is popular due to the fact that the cost of epoxy resin has gone down recently.

There are two main types of the wooden kayaks – the Stitch and Glue and Strip Built.

Stitch and Glue designs use the marine grade plywood which is about quarter inch thick. The procedure involves the cutting of te pieces of hull and deck. Small holes are then drilled along the edges and copper wire is used to stitch pieces together through the holes.

To make it more secure, the pieces after they are stitched together are glued with epoxy resin and the seams are reinforced with fibreglass. The epoxy is the allowed to dry and the stitches are then removed. To strengthen the structure, the entire boat is then covered with fibreglass.

One drawback of this construction method is that since the plywood is not flexible enough to form curves, the choices of designs are limited. If you are building a kayak for the first time, this is a good choice as the labour and skill involved is much lesser than for the strip built kayaks.

Strip built kayaks are those which are similar in shape to the fibreglass kayaks but are lighter and tougher. The deck and the hull are built with lightweight wood. Thin strips of this wood, usually the cedar, pine or redwood are used for this purpose.

The edges of these strips are glued together round about a certain form which is stapled and clamped in place and allowed to dry. A wooden shell is thus formed though not very strong.

The strength for the structure of the kayak comes from the fibreglass layer and the epoxy resin.

SKIN ON FRAME KAYAKS –

Several kayaks come under the skin on frame type. These boats are considered more traditional by design, materials used and techniques for construction. These kayaks are lighter and made of driftwood which is pegged or lashed together. Seal skin is then stretched over it as these are readily available in the Arctic regions.

Skin on frame kayaks of today have canvas or nylon cloth instead of the seal skin and are covered with neoprene, paint or a hypalon rubber coating along with the wood and aluminium.

FOLDING KAYAKS –

Folding kayaks are special types of skin on frame kayaks. These kayaks have descended from the original Eskimo kayak.

Folding kayaks consists of collapsible frame of wood, aluminium or even plastic with a combination of a skin or some kind of a water resistant and durable fabric. These kayaks are fitted inside the hull with integral air sponsons. thereby increasing their stability and making them hundred percent safe and unsinkable.

Folders are very famous due to their longevity, stability and durability. Folding kayaks are very similar to the original skin and frame kayaks as they have the same padding characteristics.

Folding kayaks always exhibit plenty of similar paddling features as the authentic skin-and-frame vessels of the circumpolar north. Of all modern kayaks, they are closest to the skin-and-frame boats of the precedent.

MILITARY KAYAKS –

Military kayaks came into existence during the Second World War. These were used mainly by the British Commando and Special Forces. These kayaks were used in the Operation Frankton raid on Bordeaux harbour.

After the war, the folding kayak came to be popularly used for the training and operations.

The sealed hull craft which is unsinkable is a derivative from surf boards and was developed mainly for leisure use. Variants of this type include the planning surf craft, touring kayaks, sea marathon kayaks, etc.

Many new variations are designed by the manufacturers for the leisure paddlers. These variations of the sit on top variety are often fitted with a rudder or a skeg for more stability.

This craft has scupper holes which are tubes running from the cockpit to the bottom of the hull. These holes facilitate the draining of the water which enters the cockpit. Sit on top kayaks normally are designed for one paddler. Sometimes they are designed to accommodate two, three or even four paddlers.

This variety of kayak is mainly used for fishing and for scuba diving. This is because this variety of kayak facilitates for the paddlers to easily enter and exit the water, change positions and access the hatches which is very essential for fishing and scuba diving.

The sit on top kayak is designed in such a way that the seat is slightly higher than the water level. Due to this, the centre of gravity for the paddler is higher than in the traditional kayak.

In order to compensate for this centre of gravity, the sit on top kayak is made wider than the traditional kayak of the same length. As a result of this, this kayak is slower than the others.

RECREATIONAL KAYAKS –

Recreational kayaks are used by people who just want a leisurely paddle on a lake, people who want to do some fun fishing or just photographing the scenic beauty. Recreational kayaks are sold the most as more and more people are taking up kayaking as a hobby.

The recreational kayaks are designed for the comfort of the leisure traveller. The cockpit is large making it easier for the paddler to enter and exit.

These kayaks are about twelve feet long and do not have much of a cargo capacity. This is because these kayaks are not used for long distance travel.

The recreational kayaks also have beams which are wide thereby providing more stability to the boat. Materials used for construction are not very expensive so more people can afford to take kayaking as an enjoyable hobby. Being a type of a touring kayak, the recreational kayaks do not perform very well at sea.

FLATWATER RACING KAYAKS -

Flatwater racing kayaks are called sprint boats. There are three types of these kayaks – the K1 for single paddler, K2 which is a kayak for two paddlers and K4 for four paddlers.

These kayaks are basically the ones which are used for racing purposes. They are used even at the Olympics by men and women in the 200m, 500m and 1000m segment of the World Championships.

Flatwater racing kayaks are made of lightweight materials like carbon fiber, fibreglass, Kevlar, etc. These kayaks can be used only on flat water. Flatwater kayaks are narrower and more unstable than the other kayaks. They are also very expensive as they are used mostly for racing purposes.

Paddling a flat water kayak is very tricky and requires a lot of expertise. In the hands of an experienced paddler, these kayaks are very fast. They have a broader beam which is wider than the paddler's hips and this allows for a long and narrow shape of the boat which reduces drag.

Flat water racing kayaks due to their length come with a rudder which is controlled by the feet of the paddler. This helps with the turning of the boat. These kayaks have quite a large turning radius.

SLALOM KAYAK –

Slalom kayaks are designed with low profile decks and a flat hull in order for it to be more manoeuvrability. These kayaks are generally made of resin reinforced with fiber like the epoxy or polyester reinforced with Kevlar, glass fiber, carbon fiber, etc.

These kayaks are therefore stiffer and have a hard skin in contrast to the kayaks made of non reinforced plastic like the rotomoulded polyethylene. Since these kayaks are stiffer, they are fast and tend to accumulate fewer scratches.

Slalom is a competitive form of kayaking and this is the only whitewater event which features in the Olympics. This event involves racers making their way from top to bottom of a river section which is designated as rapidly as it can be done. A series of double poles suspended vertically over the river called gates have to be negotiated skilfully.

Usually, there are between 18 and 25 gates which have to be navigated in a sequence. Direction of navigation is also specified like the green gates have to be negotiated in the downstream direction while the red gates have to be negotiated in the upstream direction.

Slalom competitions on a professional level have to have kayaks of specific length, width and weight. These have to be made out of carbon fiber, fibreglass or Kevlar composites as they have to be light weight and have faster hull speed.

INFLATABLE KAYAKS –

Inflatable kayaks are special types of kayaks which can be carried around in a carry bag. These kayaks are made of a type of neoprene called the hypalon, PVC or polyurethane coated cloth. These kayaks are inflated with the help of hand, foot or electric pumps with low pressure air below three PSI.

Inflatable kayaks have been mostly used on rivers or calm waters. Recently, a lot of manufacturers have developed the sit on top kayak with the folding kayak design which is also sea worthy.

Inflatable kayaks are very convenient as they are foldable and easily portable. They are quite stable with a small turning radius. Although easy to master, a lot more effort is required to paddles these kayaks and they are much slower than the traditional kayaks.

PEDAL KAYAKS –

Pedal kayaks are kayaks which use the pedals to propel the boat as a replacement for paddles. These pedals are attached to propellers or underwater flippers to propel the vessel.

This is convenient in the sense that the kayaker’s hands are free to use for other activities like fishing. One risk factor is the absence of paddle which is of a big help in capsize prevention and self rescue.

MULTIHULL OUTRIGGER KAYAKS –

Outrigger kayaks have hulls which are smaller and attached to the main hull. They are either single or double. This is done for providing more stability for fishing, kayaking or touring.

Twin hull kayaks have been in the market for many years. White water kayaking and kayaking for fishing purposes use the inflatable models. The polyethylene models are also used for fishing purposes and for recreation.

The latest models of the twin hull kayaks are operated from the inside of the cockpit and the kayaker's legs stretch to the bottom of each hull thereby providing improved stability and control. This also enables the kayakers to use the kayaks for surfing, fishing and touring in multiple positions including standing.

FISHING KAYAKS –

In the olden days, the artic native people did not use kayaks for fishing. Recently, fishing for sporting purposes using a kayak has become a popular hobby with a lot of people.

This hobby is quite is popular in fresh as well as salt water predominantly in warmer regions.

The fishing kayaks come in a lot of different varieties which are specially designed. These are similar to the recreational sit in or the sit on top varieties. These kayaks have wide beams to provide increased lateral stability. In fact, some kayaks are equipped with outriggers for stability.

The twin hull models of late are very stable and one can paddle and fish in a standing position. Kayak fishing is a very popular sport today. This is because entry to the competition is very easy.

Kayaks are easily available and are not very expensive. With the various inflatable models available in the market, kayaks are also easy to store and maintain. Launching of a kayak is also relatively easy. Customized kayaks are also available across the US.

WAVEWALKING OR STANDING KAYAKS –

Paddling in kayaks in a standing position is a very recent development though this kind of paddling while standing has been in vogue for many centuries in canoes. The twin hull kayak designs are very stable and enable the paddler to paddle in a standing position.

This type of kayaking is done on flat water, rivers and at sea including in the surf. The term used

A ROYAK IS…..

A royak is another variation of the sit on top kayak. This combines the features of a surfboard and a kayak. Royak was invented by Roy Grabenguer in the year 1968 and the craft with rotomold process was popularized by Tim Niemier.

Royak was designed with the purpose of achieving a non sinkable boat which can be easily got in and got out of even in rough waters. Royak also has enough storage space for the gear and was flexible and easily manoeuvrable. Other features include its light weight and comfort.

Royaks of today mixes effectively the features of both the sit on top and the sit inside kayaks. They are thus low, stable and have an open cockpit. This enhances the performance of the craft. This versatile, multisport design provides the paddler with immense comfort in various water conditions.

HOW TO CHOOSE YOUR KAYAK?

When you are planning to purchase your first kayak, it must be pretty confusing for you. You must be wondering whether you are buying the right style, paying the right price, etc.

Basically there are three classifications as far as the structure of the kayaks is concerned. They are –

The rigid kayaks made of plastic, Kevlar, carbon fiber, wood or fibreglass, the folding boats and the inflatable boats.

Rigid kayaks are more popular. Plastic kayaks are tough and can weather a lot of hardships. These are also the heaviest of them all and least expensive. One disadvantage of this is once it is damaged it is very difficult to repair it and most of the times it has to be replaced.

The fibreglass boat being more expensive than the plastic one is much lighter. This boat may be damaged frequently but can be repaired very effectively and easily.

Boats made of composite materials like the graphite, carbon fibre, Kevlar, etc are even more lighter and expensive.

The wooden boats are artistic and aesthetically beautiful. A wooden kayak which is smooth and warm is really beautiful and appealing. Wooden kayaks are available as a kit which can be purchased and assembled on your own. Wooden kayaks are easy to repair and maintain.

Folding boats on the other hand are easily portable and also easy to store. This boat is collapsible and is made of fabric which is stretched over a wooden or aluminium frame.

Though the folding boats are a little more expensive, they last longer than the typical hardshell and have better resale value. They are tough, stable, seaworthy and flexible but they are speedy as the hardshell boats.

Inflatable boats are easily stored and portable. They are also the least expensive kayaks. These are absolutely easy to maintain and also to get it in and out of the water.

Apart from deciding purchase of kayaks based on the structure, the purpose or type of boating they are required for is also an important consideration. For example, boats which are designed for long distance touring are different from boats used for whitewater kayaking.

There is no such thing as a multipurpose kayak. You will have to decide on what your type of kayaking activity is going to be, the paddling situations and carefully select the boat which will fulfil your requirements.

There are a few factors which you have to take into consideration before you purchase your kayak-

Your boating activity – make sure you get a kayak which is suited to the type of boating you anticipate to be doing. This is in fact the most important factor to be considered. How often you are going to be kayaking is also another aspect to be looked into.

Paddling experience – if you are a novice you will probably look for a kayak with initial stability while an experienced paddler will definitely look for a kayak with good final stability.

This is because kayaks with low initial stability tend to tip easily which makes it very uncomfortable for a beginner. This initial tippiness means the final stability is really good especially in bigger waves, which an experienced paddler will recognize and prefer.

Another thing is that while an experienced paddle would go for a tighter cockpit, a beginner will usually prefer a bigger one to enable him to get in and out with ease. If you are worried about how you would be able to perform an Eskimo roll to get back on to the boat in the event of tipping or about how you will escape from a tipped over cockpit, then it is better you go in for the sit on top model with a seat and footwells.

Weight and portability – storing, transporting and getting the kayak physically in and out of water are other factors you have to consider before you buy one.

If you have problems with any of these factors, it is advisable to go in for an inflatable boat of good quality. Alternately you can buy the lightest hard-shell that you can find and afford.

Other important factor to be considered is whether you need a single passenger or double passenger kayak. Double kayaks are perfect for couples and families. These are more stable and faster but are not as easily manoeuvrable as the single kayaks.

If you are going in for a single kayak, one thing you have to make sure is there is enough storage space for the stuff you are going to be carrying on long tourings. If you are going to be only leisure kayaking for short periods of time, then you do not have to bother much on this aspect.

Make sure the seats are comfortable and stable. If you are going to be whitewater kayaking, you should go in for a snug fitting seat. If you are going to be touring quite a bit on your kayak, you should look for a seat which has room to stretch and change positions.

As mentioned earlier, beginners usually look for a kayak which is initially stable and experienced kayakers prefer a kayak with a good secondary stability. By initial stability we actually mean that the boat has a tendency to tip over though initially they are perfectly upright and seem stable.

Final stability is the tendency of the boat to tip over. Good final stability means the boat will seem to tip over but will be constantly in that position and will not actually tip over. No boat can have both the initial and final stability. One can find out whether the kayak has initial or final stability with the shape of the hull.

Stability of the kayak also depends on the speed. If the kayak is highly stable it means it will be slow on water. It will also be wider than the fast boats which are usually narrow.

Control is another aspect to be looked into. By control we mean how well the boat turns and tracks. Normally a kayak can either turn easily or track straight. Very rarely kayaks can do both well. Length of the kayak determines how well the boat turns and tracks.

While a shorter kayak is easily manoeuvrable, the longer one will track better.

Another factor you have to look into is the bottom curvature of the hull. Curvature is between the points where the hull meets the bow and the stern which is out of the water and higher than the middle area of the hull.

This upward curvature varies from boat to boat. A boat which has a higher degree of curvature will turn easily but track less accurately than a boat with a lower curvature. Paddlers usually go in for kayaks with medium curvature.

A lot of extra options are available which you can choose from. They include the accessible hatches, sprayskirt, deck fittings, cover for the cockpit, floatation bags, a handy holder for carrying water bottles, etc. opting for the right accessories can enhance your kayaking enjoyment.

Rudder is an option a lot of people have difference of opinion about. Experienced paddlers feel they are too good to use a rudder and beginners are advised not to start depending on them. There are the others who say when it is there and convenient why not use it.

It certainly makes sense to keep a rudder handy as in consistently extreme weather conditions like strong wind and waves rudders provide the right amount of correction in course and also allows the paddler to enjoy the scenery and focus on their strokes instead of on the tracking.

The price factor is ultimately the most important one. After you decide on the kayak you are going in for, your final choice depends on the price factor. Beginner's plastic model may just cause around $250 while the expensive ones around $1500.

Fibreglass models cost between $1000 and $3000 while the more exotic boats made of composite materials may cost even more.

The affordable inflatable boats cost anywhere between $250 and $2000. Folding boats cost around $1300 for beginners and upto $ 4500 for the topnotch models.

TECHNIQUES FOR KAYAKING –

A kayaker should be able to operate their upper and lower body independently. There are a few techniques if followed will make learning to paddle very easy. Of course as the proverbial saying goes, practice makes it perfect. Keep practicing and you will eventually be a great paddler.

KAYAKING FOR BEGINNERS –

Kayaking for beginners starts with practicing to focus on the usage of their shoulders, arms and torso in order to power their paddles. Beginners should first paddle on Class II White-water Rivers by using the strength of their upper body muscles to work the paddles.

With just the strong arm style of paddling kayakers even advance to class III Whitewater Rivers. But then, this strong arm paddling is highly limiting. Paddling with a lot of power and force over a period of time makes our muscles stiff with tension and may also result in frequent tipping over when the water comes around us with great force.

KAYAKING FOR INTERMEDIATES –

Kayakers are usually thrilled when they come to discover the power of steering their boats with the help of their knees and hips. Lower body muscles like the hips and knees can be effectively used to control the left to right rotation of the kayak. This is actually like using the boat as a giant rudder to steer in the right direction.

One advantage of doing this is it leaves your upper body muscles free to concentrate on propelling the kayak forward. The trick is to learn how to control the boat with your lower body and the paddle with your upper body. If you can do this effectively you can be on your way to becoming an expert paddler.

KAYAK TECHNIQUE 1 – FORWARD SWEEP STROKE –

A good white water river trip depends on a good technique. The kayaks that are paddled on whitewater are designed in such a way that they turn very easily and quickly.

The boat tends to spin in undesirable directions due to the waves and currents in the Whitewater River. The kayak can be controlled and turned in the direction that you want to with the help of sweep strokes.

90 degree Rule – after positioning the hand on the paddles, hold it on top of the head. The next step is to adjust the position of the hand in such a way that the elbows are at a ninety degree angle.

Beginners make the mistake of holding hands too close to the paddle shaft. If your hand position is correct you get good power and endurance and also the risk of injury is minimized to a great extent. Marking the position on the paddle with a tape and consciously keeping to it will be of great help.

PADDLER'S BOX –

Your straight arms, the paddle shaft and your chest make the paddle box. Your arms should be straight whenever you apply power for your paddle strokes. The paddle should also be held as far away from the body as possible.

While you power the paddle with straight arms, you must apply pressure by rotating your torso and not bending your elbow. It is very important to get these techniques perfected.

You must take care not to bend your elbows especially at the end of the stroke i.e. while recovering from a stroke and setting yourself up for the next.

HOW TO ROTATE THE PADDLER'S BOX –

Place the paddle in water by rotating the paddler's box to one side. Make sure the blade of the paddle is completely submerged in water. All through the process we must consciously keep our arms straight. Paddle must also be kept as low as possible and almost parallel to the surface of the water.

EXECUTING THE SWEEP STROKE –

Paddle has to be swept in a wide arc from the bow which is the front end of the kayak to the stern which is the rear end. Again make sure the arms are straight and power the paddle with your powerful torso muscles.

You can use digital cameras or even video your paddling to identify the mistakes and correct them.

KAYAKING TECHNIQUE – KEEP THE BRACES LOW –

The support that you occasionally need while kayaking in whitewater can be got by bracing on the water surface with the kayak paddle.

This is usually for maintaining or regaining balance and staying upright in the kayak.

There are a few principles which can help you with effective bracing –

- Keeping the face of the paddle flat on the surface of water – it can be either the power face or the back face.
- The paddle shaft has to be held in a position parellell to the water surface. It should also be low.
- Centre of gravity has to maintained low by keeping the arms low and sitting with an aggressive posture upright.
- Remember to brace on the down current side. This is usually the direction in which you are going. Eddy currents are generally in the direction opposite to the flow of the main current.
- Arms must be kept straight and low in the front i.e. you must maintain your paddler's box.
- You do not have to bother much about whether your braces are high or low. All you have to do is when you feel you need the support, just put the paddle flat on the water surface face down as early as possible. You just have to remember to keep it low.

Paddling aggressively is an effective way to receive support and stay upright just like you do by bracing. In case you need to brace to regain support, you must immediately resume aggressive paddling. This is essential to help you through the rapid.

COMMON PADDLING MISTAKES –

Kayaking skills cannot be acquired by intuition. You need to train and learn the paddling skills to avoid mistakes and successfully perform White-Water kayaking and Sea Kayaking.

Few of the mistakes are given below –

Beginners initially hold their paddles hugging their bodies. They try to propel their kayaks by bending their elbows.

Avoid paddle hugging - This is an incorrect way of paddling. What the kayakers need to do is to maintain a strong paddler's box even as they paddle. They have to do this by extending their arms straight in the front while paddling. Holding the paddle as far away from the body as possible also helps.

Rotate your torso – People who are learning how to paddle normally tend to lock their torso and their shoulders in a forward position. In order to use the torso muscles maximum to generate power, kayakers need to keep their arms straight and perform a correct torso rotation. Doing this is also important in another aspect. It helps in avoiding injuries to the shoulders and arms while paddling.

Do not brace in air – When they feel they need support, beginners tend to raise their paddles very high in the air in an effort to brace. When they find the river tossing their boats around, they raise the paddles even higher.

When you are bracing in the air, you do not get any support from bracing on the water. This results in a high centre of gravity and most often the boat flips over and paddlers are forced to swim.

In order to avoid this, consciously keep the paddler's box low on the decks. Raise only one hand at a time to perform a vertical stroke like the forward paddle.

Do not freeze up – A lot of beginners tend to freeze up when the whitewater action overwhelms them. They tend to stop paddling immediately which results in the kayak tipping over.

All you have to do is keep maintaining aggressive paddling to get through the rapid. When you feel the situation is serious, you have to correct the course by paddling more aggressively forward.

Do not lean back – When big waves crash in on their faces and heads, beginners normally tend to lean back as a natural reflex. But you must consciously avoid doing this.

All you have to do is maintain an upright posture and lean forward aggressively and paddle all the time. Especially when it is too late to avoid the wave, if you lean back you will surely be knocked back very easily.

The best thing to do will be to paddle forward aggressively and punch through these waves while maintaining your rhythm. Alternately, you can stab the wave in the gut using the paddle as a brace letting the wave crash over your head and continue forward paddling.

Do not shift your body weight to upstream side – Most of the beginners flip their boats as they tend to lean their body weight towards the upstream side of the boat. This happens so fast that before they can even realise what is happening their heads are repeatedly slammed by the water.

This can be avoided by maintaining control over the weight and edge and making sure you paddle brace on the downstream side of the boat.

USING THE FORWARD PADDLE STROKE TO PROPEL KAYAK –

Even though the river assists in the forward momentum, whitewater kayak paddlers in navigating the boat forward, paddlers need to use their torso rotation to generate powerful and high endurance strokes along with the current, across the current and sometimes even against the current in emergencies.

Torso rotation is very important to generate this kind of an explosive power and paddling for kayaking.

HOLDING THE KAYAK PADDLE –

It is extremely important to learn the proper method of holding the paddle. This is the only key to develop good body mechanics and powerful, controlled and efficient paddle strokes.

There are a few factors to be looked into in order to achieve this. Choosing the paddle of the right length is one of them. Choose a paddle which is as tall as you can reach with your second knuckle.

If you are paddling a squirtboat or other low volume kayaks, then you need to go in for shorter paddles. Inflatable kayaks also need longer paddles.

Another factor you have to be careful about is how you set your hand position on the paddle. To achieve the right position, place paddle shaft over your head and elbows held at ninety degrees.

After marking this position on the paddle shaft maybe with a tape you can just follow this position consciously making sure your hands do not drift closer as the day progresses.

The next important aspect is the control of the right hand. The right hand should hold the paddle on the right side used for paddling of the kayak.

If you need to get paddle blade in position to paddle on the left side, you have to then the paddle shaft is to be rotated on the left hand.

When you are travelling, make sure you take your own paddles. It is very difficult to control the paddle if you get a wrong hand control to use.

The paddler's box is another important thing to be remembered. It is a square produced by your chest, straight arms and the paddle shaft. You will have to hold paddle as far away from your body as possible by reaching out with straight arms.

You must also remember to keep the paddle and your hands as low as possible. If you practice and maintain this paddler's box throughout your journey, you can achieve tremendous power and endurance and can be free of risk of injuries.

JOIN A BOATING CLUB –

It is a very good idea to join one or more of the boating clubs where you can meet other kayakers and be invited to private river trips and club trips. There are a lot of paddling clubs especially in California.

The Gold Country Paddlers, California Floaters, California Kayak Friends, Loma Prieta Paddlers, etc are a few of the well known ones.

KAYAKING SKILLS FOR CLASS II –

As we have seen earlier, novices need to have some basic skills for kayaking on their own without an experienced kayaker to lead them and to navigate a class II river safely.

Apart from the wet exit, Eskimo roll, forward stroke, sweep stroke, brace, etc beginners also need to have skills of ferrying, eddy turn, swimming in whitewater and recognizing and avoid hazards.

Maintaining the bow on an upstream angle and paddling across the eddy line is called ferrying. The main thing to do here is to maintain the upstream angle even while paddling in the current all they way across the river.

Eddy turn is used to enter and exit eddies. Doing this can be good fun if done properly or can end in the tipping of your kayak if not done properly.

In the eventuality of your kayak tipping over, you have to float on your back with your feet up after getting in that critical breath of air. You must just hang on to your paddle. Keep the other hand free to grab the rescue boat as soon as it arrives. It is a good idea to kick your feet to assist the rescue boater to tow you to safety.

It is very important to identify hazards such as ledge holes, pourovers, strainers and undercuts. Make sure you avoid these hazards. In case you are not able to do that and come in contact with a rock, hug the rock tight and hang on there. Then slowly wiggle forward or backwards to get out of there as soon as possible.

KAYAKING IN CLASS II GROUP –

When you kayak in a group, it is very important to follow the leader. Concentrate and listen to the leader as to what is coming up, watch him and carefully follow him.

If the group is spread too far away from each other, you can use hand and paddle signals for communicating with the members.

It is a good idea to watch what happens to the leader's kayak and its reactions to various conditions in the river. You can choose a different route depending on your conditions. Just follow the river and figure out what has to be done and have a fun way through the rapids.

PROTECTING YOUR SKIN –

It is very important to protect your skin from the harsh rays of the sun. Constant exposure to the rays of the sun when you kayak for long periods of time can be damaging to your skin.

Your skin will tend to be affected by a number of ways like skin burn, premature aging and in extreme cases, even skin cancer. Various sun block creams are available in the market today which will be of help. These sun block creams contain blocking agents like the UVA and B.

ELTA MD Skincare Sun Block, Blue Lizard Sun Block, Trader Joe's Sun Block, REI Sun Block, etc are some of the well known sun block creams that are available in the market.

You can refer the "Cosmetic Safety Database" developed by the "Environmental Working Group" for information on the safest and best sun block cream you can use.

KAYAK FITNESS –

It is very important for kayakers to keep themselves physically fit. This develops their endurance, speed, flexibility and strength and also helps them avoid injuries.

The basic fitness any kayaker should work on is the stretching, warming up and cooling down. If you make an effort to do this, your kayaking will be more fun and enjoyable.

Static stretching is one kind of stretching which involves moving to the outer mobility limit for some of the muscle groups and applying pressure continuously to extend the mobility range.

Static stretching is best done after your workout for cooling down when you need to relax and develop flexibility for your exhausted and thoroughly warmed up muscles.

Dynamic stretching is a way of waking up muscles getting them ready to work hard. This is actually moving your muscles around through the full range of motion that you will be using them for during the training.

Dynamic stretching therefore improves speed of movement, momentum and muscles. This stretching can be done just before a competition as it reduces tightness of the muscles. This stretching is actually a pre workout stretch which improves blood flow to the muscles and lubricates the joints.\

After you are in your kayak, you can do a series of stretches before you actually start kayaking. Given below are some stretches which will help a lot.

Shoulders/Torso 1

Your elbow has to be under your chin and the other hand should push the elbow towards the opposite shoulder.

You can stretch more intensely you must rotate your shoulders in the same direction you are pushing.

You have to apply continuous pressure for at least forty seconds and hold the stretch before repeating with the opposite elbow.

Shoulders/Torso 2

This stretch has to be done by lifting your arm up and putting your wrist behind your head. The wrist has to be pulled towards the opposite shoulder.

You can intensify the stretch by bending your torso to the side in the same direction you are pulling.

Again you must hold the stretch with a continuous pressure for at least forty seconds and repeat with the opposite arm.

Torso stretch with paddle leverage 1

Stretch completely for torso rotation till you can see the stern or the back end of your boat.

Apply continuous pressure by holding on for forty seconds and repeat for the opposite side.

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Torso stretch with paddle leverage 2

Stretch the bottom hand by reaching across the bow (front) of your kayak and placing the power face of the paddle against the bow.

Next, push out the top hand use the vertical paddle to get sufficient leverage. This will allow you to swivel your torso in the direction of the stern (back) of your kayak.

Apply continuous pressure and hold for forty seconds before repeating on the other side.

Stretching has to be done whenever you feel stiff. It can be before, during or after kayaking. It is a good idea to stretch first thing in the morning on the days you are going on kayaking trips.

Important stretches for kayakers include the arm/shoulder and torso areas as it is the arm/shoulders which move our muscles and the torso which powers our boat when we paddle following the correct technique. Hamstring stretching is also very important before you go kayaking.

The stretching regime goes like this –

Shoulder one – putting your elbow under the chin and using the other hand push the elbow towards the opposite shoulder and rotate in the same direction you are pushing. Repeat for opposite shoulder.

Shoulder two – put wrist behind head by lifting your arm. To intensify stretch bend the torso towards the direction you are pulling. Repeat for opposite wrist.

Torso rotation – sit with one leg stretched in front. Bend other leg by crossing over the straight leg putting the foot down under the knee. Using elbow pushes on bent knee rotate away from straight leg. Repeat for opposite side.

Hamstrings/lower back. Sit down and keep both legs straight out in the front region. Grab hold of your feet and pull your nose near your toes. To strengthen the stretch do each leg one by one.

Consciously making sure you stretch your muscles before you go leisure kayaking or for competitions will ensure better performance. This will also make sure you do not go in for any kind of injuries to your muscles.

This is actually a small effort on your part but goes a long way in providing you with uninterrupted enjoyment of this sport.

SAFETY AND PRECAUTIONS FOR KAYAKING-

For beginners, kayaking will prove to be the most thrilling experience of their lives. However, adventurous kayaking maybe, it can also be a very dangerous sport. A person needs to be extremely fit, both mentally as well as physically, to participate in kayaking activities. Moreover, the conditions as well as the water bodies where kayaking activities take place can be highly unpredictable as well as turbulent. To enjoy this sport to the fullest, it is absolutely necessary to take certain precautions as well as safety measures.

General Safety tips regarding Kayaking have been designed keeping in mind the conditions of water, kayaking equipments, Kayaking gear, as well as the kayakers' common sense.

Common Sense:

Your instinct as well as your awareness can be a big help for you incase you end up in some life-threatening situation while kayaking. Before you embark on a Kayaking expedition, there are certain questions that should be considered before you head out. Questions such as;

- Am I truly built for kayaking?
- What kind of climatic conditions will I come upon while Kayaking?
- Will I be able to handle such extreme conditions?
- Am I carrying the right kayaking gear as well as safety equipment to support me in harsh conditions?

Hypothermia or Cold Water Immersion:

Exposure to cold water to prolonged periods while kayaking can lead to some serious damage to your body. You have to realize the following facts before you try you hand at Kayaking;

- Your body has a 25 % more chance to lose heat in water as compared to while in regular conditions.
- If you are Kayaking in cold weather conditions you have to realize that the water temperatures are always a lot more cooler than the surrounding air temperature.
- Sea Kayakers are always at a risk of Hypothermia
- Sometimes Hypothermia can also be caused by rain or your own sweat.

Proper Clothing:

You have to wear proper water proof gear as well as assigned clothing while you are kayaking. The climatic conditions are highly unpredictable and are bound to change rapidly as well as suddenly. Your clothes have to protect you from cold weather as well as they should be comfortable enough to allow you free movement.

Proper Equipment:

Try to get familiar with all your Kayaking gear as well as equipments. Learn how to use them correctly and also discuss their limitations with your instructor. Rudders or skegs are important kayaking equipments where high tides, high winds as well as rapid currents are to be dealt with. Make sure you select the proper weight of this equipment so that you don't end up carrying too much load on your kayaking trip.

Recommended Safety Procedures:

- Dress your body keeping in mind that you might end up immersed in cold water. Also remember that you will be spending a lot of time being wet.
- Always get an idea of the air temperature as well as the water temperature from your Kayaking instructor or guide before you plunge into the activity.
- Try to get a complete idea about the things to expect if you or your companions catch Hypothermia.
- You have to keep in mind that Hypothermia occurs in different stages gradually, so it has to be treated according to the symptoms it shows at that particular moment.

- You have to wear waterproof gear, yet it has to be comfortable and breathable. Never remove your clothing while you are in water!
- Always dress in layers and bring a waterproof bag filled with dry clothes and first aid kits.
- Always keep signaling devices such as whistles, flare guns as well as high power torches with you incase you need to signal for help. Also, try to carry an extra blanket with you at all times.
- You have to be self-sufficient and self-reliant at all times when you are on a kayaking trip.
- Be prepared to experience sudden temperature as well as climatic changes that can occur during your kayaking expedition.
- Most importantly, listen carefully as well as follow all the instructions given to you by your Kayaking trip. Ignorance will not be a bliss during such kayaking trips.

SYNOPSIS –

Kayaking is a hobby and a sport which has seen a great surge in popularity in recent times.

Kayakers love this sport as it give them a complete access to all the unexplored parts of a river that cannot be reached by bulky water crafts. Kayaking also offers relaxation and solitude to people who are looking for peace.

If you are not yet a kayaker what are you waiting for? Go get your kayak and move ahead to start a most wonderful and enjoyable hobby of your lifetime!!!