# Inland ship (Traffic/Safety of Navigation) Rules, 2001

# **INDEX**

Section	Subject	Page
	Chapter 1 - Beginning	
1.	Brief Introduction	3
2.	Definition	3
3.	Implementation	4
4.	Design & Construction	4
5.	Responsibility	4
	Chapter 2 - Lights & Shapes	
6.	General measures	4
7.	Traffic lights	4
8.	Power Driven Vessels	5
9.	Towing and Sail ships lights and shapes	5
10.	Road ferry	6
11.	Fishing vessel & Boat	6
12.	Anchored vessel	6
13.	Aground vessel	6
14.	Not under command vessel	7
15.	Under water operation, Dredging, Diving vessel	7
16.	Vessel Carrying flammable oil	7
17.	Search Light	8
	Chapter 3 – Sound Signals	
18.	Sound signal during fog	8
19.	General warning signal	8
20.	Sound signal for vessel visible to each other	9
21.	Drawing attention of other mechanically propelled ship	9
<u> </u>	Praving attended of other incontainedity property stilp	J

Section	Subject	Page
	Chapter 4 – Traffic law	
22.	Ship's speed during fog etc	9
23.	Ships in head to head situation	9
24.	Passing ships	9
25.	Avoiding to overtake other vessel	9
26.	Overtaking other vessel	10
27.	Ships responsibility to one another	10
28.	Responsibility of ships running in same direction	10
29.	Traffic at narrow channel	10
30.	Running ahead at starting	11
31.	Traffic at junction of channels	11
32.	Mechanically propelled ships, sail ship & fishing vessel	11
33.	Clear view for operation of ships	11
34.	Inland vessel operation in the boundary of Bangladesh s	eaports 11
	Chapter 5 – Safety of Navigation Equip	ment
35.	Navigation equipment	12
36.	Signalling equipment	12
37.	Internal communication equipment	12
38.	External communication equipment	12
39.	Anchoring & Mooring equipment	13
40.	Bilge pump	13
41.	Gangway	13
42.	Approval of equipment for ships of inland waterway	13
	Chapter 6 – Inland vessel movement restrict	tion
43.	Non registered vessels	13
44.	Open passenger launch	14
45.	Navigation at open sea	14
46.	Navigation at night	14
47.	Restriction regarding wind	14

# **Chapter 1- Beginning**

#### 1. Brief Introduction

This regulation shall be termed as Inland Ship(traffic) rules.2001

#### 2. Definitions:

Subject to nothing is contrary to subject or reference, in this regulation:

- a) "Ordinance" means The Inland Shipping Ordinance 1976(LXXII of 1976)
- b) "Inland water ways' means 'Inland water" as termed in section 2(f) of this rules.
- c) "Ship" or "Inland ship" means "inland ship" defined in ordinance section 2(e)
- d) "ISSA" means Inland Ship Safety Administration
- e) "Tanker" means ship carrying liquid in bulk in it's tank
- f) "Sail ship" means any ship operating with the aid of sails and propelling machinery not used even though such machinery fitted or occasionally used.
- g) "BIWTA" means Bangladesh Inland Water Transport Authority
- h) "BIWTC" means Bangladesh Inland Water Transport Corporation
- i) "Floating equipment" means non propelled various equipments like dredger, floating crane etc which are used for various works in floating condition
- j) "Fishing vessel" means vessel engaged in fishing and built for this purpose
- k) "Passenger" means any person among people on board ship or inland ship except ship's master, officer & crews. However child below one year age shall not be treated as passenger.
- "Passenger ship" means ship engaged in carrying more than 12 passengers having weathertight deck. And ship having more than one decks shall be included to this;
- m) "Mechanically Propelled ship" means inland vessel operated by mechanical means And
- n) "Road Ferry" means open flash deck ship engaged in transportation of 12 or more passengers and more than one vehicles

#### 3. Implementation:

Unless there are other laws, this rules shall be applicable for all inland ships and floating equipment

# 4. Design & Construction

All ships and floating equipments shall have to be designed, constructed and equipped ensuring best naval architectural rules, operational capabilities, safety & structural integrity to the satisfaction of Engineer and ship surveyor

# 5. Responsibility

- i) Anything of this rule shall not relieve inland ships or it's owners, masters or crews from following punishments
  - a) Negligence in complying this rule
  - b) Negligence in awareness in general to be followed by crews
- ii) Due diligence to be given to all circumstances towards all dangers of ship traffic and collision and associated limitations of inland vessels for which cases compliance to this rules might not be required.

# Chapter 2 - Lights & Shapes

#### 6. General measures

- i) Light related rules given in this section shall be followed from sunset to sunrise in all weather condition. In restricted visibility, lights shall be shown from sunrise to sunset also. During showing lights it has to be ensured that no confusion are arisen with one light with another light.
- ii) Lights shall be ISSA approved type
- iii) Rules regarding shapes rules to be followed during day light
- iv) This section shall be applicable to all ships, boats & floating equipment regardless of type, size and propelling system.

# **7.** Traffic lights

- i) "Masthead light" means a white light placed over the fore and aft centerline of the vessel showing an unbroken light over an arc of horizon of 225 degrees and so fixed as to show the light from right ahead to 22.5 degrees abaft the beam on either side of the vessel.
- "Sidelights" means a green light on the starboard side and a red light on the port side each showing an unbroken light over an arc of horizon of 112.5 degrees and so fixed as to show the light from right ahead to 22.5 degrees abaft the beam on the respective side. In a vessel of less than 20 meters in length the sidelights may be combined in one lantern carried on the fore and aft centerline of the vessel

- "Sternlight", means a white light placed as nearly as practicable at the stern showing an unbroken light over an arc of horizon of 135 degrees and so fixed as to show the light 67.5 degrees from right aft on each side of the vessel.
- iv) "Towing light" means a yellow light having the same characteristics as the "sternlight" defined in paragraph (c) of this Rule

# 8. Power Driven Vessels Lights

A power driven vessel underway shall exhibit following lights

- i) In case of vessel or floating equipment of 24m or above length
  - a) One masthead light forward at least 5m above the vessels forward structure. If no mast at forward is fitted, then the light shall be at least 2m above the highest deck covering at forward. Also the light must be visible from minimum distance of 3000m.
  - b) Two side lights abaft of and at least 2m below the forward one. Also the light must be visible from minimum distance of 1500m which shall be placed with internal screen as such that the light remains at least 1(one) meter away from screen and lights are not visible from bow. Also the screens must be painted black.
  - c) One stern light visible from minimum distance of 1500m
- ii) In case of vessel or floating equipment of 12m or above length but less than 24m length
  - a) One masthead light forward at least 3m above the vessels forward structure. If no mast at forward is fitted, then the light shall be at least 1m above the highest deck covering at forward. Also the light must be visible from minimum distance of 2000m.
  - b) Two side lights abaft of and at least 1m below the forward one. Also the light must be visible from minimum distance of 1000m which shall be placed with internal screen as such that the light remains at least 600 mm away from screen and lights are not visible from bow. Also the screens must be painted black.
  - c) One stern light visible from minimum distance of 1000m
- iii) In case of vessel or floating equipment of 6.5m or above length but less than 12m length
  - a) One masthead light forward at least 1.5m above the vessels forward structure. Also the light must be visible from minimum distance of 2000m.
  - b) Two side lights abaft of and at least 0.5m below the forward one. Also the light must be visible from minimum distance of 1000m
  - c) One stern light visible from minimum distance of 1000m

# 9. Towing and Sail ships lights and shapes

- i) A towing vessel shall exhibit a towing light in a vertical line above the sternlight. An additional masthead light in a vertical line at 1m above 1<sup>st</sup> masthead light.
- ii) Lights must be visible from same distance as mentioned section (8)

- iii) During daylight a 1m length black diamond shape shall be exhibited where it can best be seen
- iv) When a number of vessels or floating equipment being moored alongside in a group, for the the purpose of exhibiting side lights the group of vessels shall be treated as one vessel.
- v) When a power driven vessel is being pushed ahead; shall exhibit red & green sidelights at the forward mast
- vi) When a vessel being towed ahead, such ship or floating equipment shall exhibit at the sidelights or stern light
- vii) When the length of the towed vessel exceeds 200 meters, a 1m length black diamond shape shall be exhibited where it can best be seen.
- viii) A sailing vessel or oar driven vessel underway shall exhibit at forward where they can best be seen, one all-round lights in a vertical line.

#### 10. Road ferry

A Road Ferry shall exhibit following lights & shapes

- i) During night hours, three red lights fitted on a equal sides triangle against centre line located minimum one meter equidistant visible from at least 1000m distance where it can best be seen
- ii) During daylight hours, two black balls of each 4m length & 0.5m dia fitted horizontally against centre line located minimum one meter

# 11. Fishing vessel & Boat

Fishing vessel shall exhibit following lights & shapes

- i) During night hours, two all-round lights in a vertical line 1m above the one another visible from at least 1000m in addition to lights mentioned in section(8),
- ii) During daylight hours, a shape consisting of two cones with their apexes together in a vertical line one above the other; For vessel less than 20 meters in length shall instead of this shape exhibit a basket;

#### 12. Anchored vessel

A vessel at anchor & moored with buoy shall exhibit during daylight hours a 0.5m diameter black ball in the fore part and during night hours an all-round white light at least 5m above both vessels structure or at least 2m above the highest deck covering at forward. Also the light must be visible from minimum distance of 1500m.

# 13. Aground vessel

Agrounded vessel shall exhibit following lights and shapes at best visible locations of vessel

- i) during daylight hours, 3(three) 0.5m diameter black ball vertically 1m equidistant
- ii) during night hours an all-round white light visible from minimum distance of 1500m. In addition, two all-round red light located vertically 1m away from each other visible from minimum distance of 1500m.

#### 14. Not under command vessel

- i) When a Power driven vessel become out of control shall exhibit following lights and shapes at best visible locations of vessel
  - a) during daylight hours, 2(two) 0.5m diameter black ball vertically 1m equidistant
  - b) during night hours, two all-round red light located vertically 1m away from each other visible from minimum distance of 1500m.
- ii) A Power driven not under command vessel while anchored shall exhibit during daylight hours a 0.5m diameter black ball in the fore part and during night hours an all-round white light at least 5m above both vessels structure or at least 2m above the highest deck covering at forward. Also the light must be visible from minimum distance of 1500m.

# 15. Under water operation vessel

A vessel engaged in dredging, diving operation or similar underwater operations, when restricted in her ability to maneuver, shall exhibit the lights and shapes:

- i) during night hours, two all-round red lights in a vertical line 1m away from each other to indicate the side on which the obstruction exists visible from minimum distance of 1500m.
- ii) during night hours, two all-round green lights in a vertical line 1m away from each other to indicate the side on which another vessel may pass visible from minimum distance of 1500m.
- iii) during daylight hours, two black balls in a vertical line 1m away from each other to indicate the side on which the obstruction exists visible from minimum distance of 1500m
- iv) during daylight hours, two double cones in a vertical line 1m away from each other to indicate the side on which another vessel may pass visible from minimum distance of 1500m

# 16. Vessel Carrying flammable oil

- i) A vessel engaged in carrying flammable oil, fuel or other goods shall exhibit the lights and shapes:
  - a) during night hours, one all-round red lights visible from minimum distance of 1500m.
  - b) during daylight hours, one red flag
  - ii). Oil or chemical tankers shall always exhibit light & flag described in 16(i) in addition to usual traffic lights & signals and/or anchor light & signals described in section 8.

# 17. Search Light

- i). All power driven vessels operating at night hours shall be fitted with a remote controlled search light(from wheel house) capable to throw light to minimum 80m distance. Such light shall be able to rotate 22.5° from forward to aft at both port & starboard sides
- ii) Power driven vessel less than 5.5m length shall carry a torch light and shall exhibit light flicker while another vessel is proceeding toward it.

# Chapter 3 - Sound Signals

# 18. Sound signal during fog

During fog, light fog, heavy rain or rain with thunder storm, following signals shall be used at all times (day or night)

- a) A power driven vessel making way through the water shall sound at intervals of not more than 1 minutes one prolonged blast.
- b) A power driven vessel underway but stopped and making no way through the water shall sound at intervals of no more than 1 minute two prolonged blasts.
- c) A power driven vessel while anchored shall sound at intervals of no more than 1 minute one prolonged blast of 5 seconds duration
- d) A power driven vessel grounded at beach or at channel shall sound at intervals of no more than 1 minute one prolonged blast of 5 seconds duration followed by 3 clear sound by ship's horn
- e) A power driven vessel not under command or a vessel restricted in her ability to maneuver, shall sound at intervals of no more than 1 minute one prolonged blast followed by quick blasting from horn
- f) When a power driven vessel is being towed by chain or ropes from sides and pulled from aft, then vessel shall sound signals as per(a) or (b) as applicable.
- g) When a power driven vessel tow one or more inland vessels by chain or ropes, then vessel shall sound signals as per(f) and the last towed vessel shall sound three prolonged blasts after sound signal of the towing vessel.

# 19. General warning signal

One prolonged blast to be sounded by ship's horn in following cases]

- i). When any power driven vessel proceeds towards it's destination
- ii). To draw attention of other inland vessels at clear passages
- iii). At the time of proceeding to a turning

#### 20. Sound signal for vessel visible to each other

When vessels are in sight of one another, a power driven vessel under way, when maneuvering as authorized shall indicate by the following signals on her whistle:

- i). one short blast to mean "I am altering my course to starboard";
- ii). two short blasts to mean "I am altering my course to port";
- iii). three short blasts to mean "I am operating astern propulsion".

# 21. Drawing attention of other power driven vessel

When vessels in sight of one another are approaching each other and from any cause either vessel fails to understand the intentions or actions of the other, or is in doubt whether sufficient action is being taken by the other to avoid collision, the vessel in doubt shall immediately indicate such doubt by giving at least five short and rapid blasts on the whistle.

# Chapter 4 - Traffic law

# 22. Ship's speed during fog etc

- i). During fog, light fog, heavy rain or rain with thunder storm, a power driven vessel shall proceed at a safe speed adapted to the prevailing circumstances or anchor at safe place keeping her engines running or stopped.
- ii). A power driven vessel which hears apparently forward of her beam the fog signal of another vessel; position of which cannot be determined correctly, shall reduce her speed or stop engine evaluating prevailing situation and navigate with extreme caution until danger of collision is over.

# 23. Ships head on situation

When two power driven vessels are meeting on reciprocal or nearly reciprocal courses so as to involve risk of collision each shall alter her course to starboard so that each shall pass on the port side of the other.

# **24.** Crossing ships

When two power driven vessels are crossing so as to involve risk of collision, the vessel which has the other on her own starboard side shall keep out of the way and shall, if the circumstances of the case admit, avoid crossing ahead of the other vessel.

# 25. Avoiding to overtake other vessel

Each power driven vessel obliged to remain away from another vessel's passageway within the meaning of these rules shall avoid overtaking such vessel despite situation permit her to overtake

# 26. Overtaking other vessel

Notwithstanding anything contained in this Rules, any vessel overtaking any other shall keep out of the way of the vessel being overtaken

# 27. Ships responsibility to one another

- i). A power driven vessel underway shall keep out of the way of:
  - a) vessel not under command; \
  - b) vessel restricted in her ability to maneuver;
  - c) vessel engaged in fishing;
  - d). sailing vessel;
  - ii). A sailing vessel under way shall keep out of the way of:
    - a) vessel not under command;
    - b) vessel restricted in her ability to maneuver;
    - c) vessel engaged in fishing;
  - iii). A vessel engaged in fishing when underway shall, so far as possible, keep out of the way of:
    - a) a vessel not under command;
    - b) a vessel restricted in her ability to maneuver.

# 28. Responsibility of ships running in same direction

- i). Where one of two vessel is to keep out of the way of the other shall keep her course & speed.
- ii). A power driven vessel sailing in same direction, shall draw attention by sounding a prolonged blast followed by 5(five) short rapid blasts, as soon as it becomes apparent to her that the vessel required to keep out of the way to avoid collision is not taking appropriate action in accordance with these Rules.
- iii). When, from any cause, the vessel required to keep her course and speed finds herself so close that collision cannot be avoided by the action of the give-way vessel alone, she shall take such action as will best aid to avoid collision and shall notify other vessel about action taken by her giving appropriate sound signal

#### 29 Traffic at narrow channel

- i). A vessel proceeding along the course of a narrow channel shall keep as near to the outer limit of the channel which lies on her starboard side as is safe and practicable.
- ii). When two power driven vessels(with or without side tow) meet such a narrow channel or place where crossing each other become difficult due presence of a third vessel; in that case speed of the vessel proceeding against tide shall be reduced and keep her close to the shore at it's starboard side till other vessel cross & clear.
- iii). When two power driven vessels crossing each other at the bend of a narrow channel the vessel proceeding against tide shall be stopped and remain there till other vessel cross & clear.

#### 30. Starting passage

A power driven vessel shall not move from berth or mooring or anchorage when another vessel seen seen to be proceeding towards it at a distance which is doubtful that incoming vessel may not safely cross her.

#### 31 Navigation at junction of channels

When two power driven vessels shall be nearing to cross at the entrance of a narrow passage, the vessel at wider channel shall not enter into narrow channel till the vessel in narrow channel crossed her.

# 32. Power driven vessel, sailing ship & fishing vessel

No sailing ship or fishing vessel shall not obstruct safe navigation of power driven vessel on navigation channel.

# 33.Clear view for navigation of vessels

Vessel navigation to be controlled from a location having clear view without any obstruction and view clear from forward centre to 22.5° beam port & stbd side.

# 34.Inland vessel operation in the areas of Bangladesh international seaports

- i). A vessel without command by a certified master having Certificate of Competency with endorsement for Karnafuly river or in cases Passur river included shall not be allowed to operate in the areas of international seaports of Bangladesh
- ii) A power driven inland vessel while navigating from one destination to another destination or crossing from one side of channel to other side shall not obstruct safe navigation of sea going ship or shall not create risk of collision. If required the power driven inland vessel shall reduce it's speed or stop or reverse engine running direction or wait at a safe distance.
- iii). All power driven inland vessels operating in international seaport areas of Bangladesh shall have to comply requirement of relevant port authorities, supplementary rules, orders and instructions
- iv). All power driven inland vessels shall have to comply International Collision Regulation while crossing a sea going ship in international seaport areas of Bangladesh
- v). An inland vessel shall not cross bay without prior authorization from appropriate authority.

# **Chapter 5 – Safety of Navigation Equipment**

#### 35. Navigation equipment

Power driven inland vessels shall have following navigation equipment:

- i). A magnetic compass to all passenger vessels regardless of size and other vessels of 6.5m or above length. Compass to be illuminated during night hours
- ii). Two binoculars to all passenger vessel regardless of size & other vessels of 6.5m or above length
- iii). Wind speed and direction measuring equipment to all passenger vessels and passenger launches

# 36. Signalling equipment

Inland vessels, Boats and floating equipment shall have following light & sound signals

- i). Required lights and shapes mentioned in previous sections of this rule
- ii). Electric or pneumatic horn audible from not less than 2000m distance
- iii). Additional manual(hand operated) horn to passenger vessels and oil tankers
- iv). A brass bell of at least 200mm diameter shall be provided at forward of all vessels & floating equipment.

# 37.Internal communication equipment

All power driven inland vessels shall be fitted with following internal communication equipment

- i). Communication or alarm transmission system between wheel house(bridge) and engine room
- ii). A loud hailer system for inland passenger vessels of more than 200 passenger capacity
- iii). Communication system between wheel house(bridge) and emergency steering position if any

# 38. External communication equipment

i). A radio receiver shall be provided to all inland vessels and floating equipment registered under Inland Shipping Ordinance 1976.

ii). A VHF Radio Telephone shall be provided to all inland passenger vessels of more than 400 passenger capacity, all oil tankers and all vessels carrying dangerous goods.

# 39. Anchoring & Mooring equipment

- i). All inland vessels shall be provided with sufficient mooring ropes and wires.
- ii). An anchor with sufficient length of anchor chain and one additional anchor
- iii). Hand driven or power driven anchor windlass, mooring winch and capstan shall be fitted to all vessels

#### 40.Bilge pump

Inland vessels, Boats and floating equipment shall be fitted with hand driven or power driven bilge pump(s)

# 41. Gangway

All inland passenger vessels shall be fitted with gang way(accommodation ladder) of sufficient length, which shall be of at least 600mm width and rope attached to it.

#### 42. Approval of equipment for ships of inland waterway

All vessels, floating equipment and other equipment intended to be operating in inland water way shall have to be approved by Inland Ship Safety Administration.

# **Chapter 6 – Inland vessel movement restriction**

# 43.Non registered vessels

- i). Any vessel or boat or floating equipment not registered and not surveyed shall not be allowed to operate on waterway extended from Baghabari, Dhaka, Narayanganj and Bhairb to open sea and waterway to Khulna, Mongla, Barisal & Chandpur or any other inland waterway or operated on inland waterways earlier or may operate later but presently detained/stopped. Such vessels or structure can not be operated in inland waterway directly or indirectly.
- ii). Any ship or boat not registered under Inland shipping Ordinance 1976 shall not be allowed to embark or disembark within 1(one) kilometer distance of BIWTA or BIWTC stations or Ghats.
- iii). Any unregistered boat or floating equipment if operated after sunset, engaged in fishing or anchored shall have to exhibit lights as per this rule.

#### 44. Open passenger launch

Any open passenger launch of less than 20m length shall not be allowed to operate in rough weather for more than 2hrs

# 45. Navigation at open sea

- i). No inland vessel shall be allowed to navigate outside inland waterways.
- ii). Other ships and floating equipment may navigate to Bangladesh coastal waters between 15<sup>th</sup> November to 28<sup>th</sup> February subject to exemption/permission obtained from Principal Officer, Mercantile Marine Department(MMD)

# 46. Navigation at night

All inland vessels, boat or floating equipment shall have to exhibit lights as per this rule between sunset to sunrise

# 47. Restriction regarding wind

- i). A passenger vessel or launch shall not start voyage if wind speed exceeds 10meter/second or exceed wind speed as calculated by formula given in inland vessels conventional rule
- ii). If any inland vessel faces higher wind speed than given in (i) while underway, shall take safe refuge or stop engine & remain afloat without anchoring or mooring with ropes if refuge not possible.

By order of the President

Md Nasir Uddin

Deputy Secretary(Shipping)