NATIONAL CENTRE FOR DISEASE INFORMATICS AND RESEARCH

Indian Council of Medical Research

HOSPITAL BASED STROKE REGISTRIES

Core Form

I. IDENTIFYING INFORMATION

1. Name of Participating Centre : ..... Centre Code ☐☐☐

2. HBSR Registration Number : ☐☐☐☐☐☐☐

3. Registration at Reporting Institution

3.1 Name of source of registration .....

3.2 Name of department / unit / physician: .....

3.3 Hospital Registration Number: ☐☐☐☐☐☐☐

4. Full Name: ..... (First) ..... (Middle) ..... (Last)

5. Place of residence (place of usual residence where the patient has been residing for the past 1 year):

5.1. Urban

House No. .....

Road / Street Name.....

Area / Locality.....

Ward / Corporation / Division ☐☐☐

Name of the City / Town.....

Name of District *(In capitals)*.....

Telephone No(s).: Off. .....

Mobile No. .....

5.2. Non-urban / Rural

House No. and Ward.....

Name of Gram Panchayat / Village, etc.:

.....

Name of Sub-Unit of District (Taluk / Tehsil / other)

.....

Name of PHC / Sub Centre .....

Postal Pin Code ☐☐☐☐☐☐

Res. .....

Email ID .....

5.3 Other address:

Address: .....

District: .....

Pin code: ☐☐☐☐☐☐

Telephone No. .....

6. Duration of stay in place of usual residence (years) ☐☐

7. Age (years) ☐☐ Date of Birth: ☐☐☐☐☐☐

8. Sex 1.Male 2.Female 3.Others ☐

9. Number of languages spoken (Multiple options can be chosen)

1. Assamese ☐ 2. Bengali ☐ 3. Gujarathi ☐ 4. Hindi ☐ 5. Kannada ☐ 6. Kashmir ☐ 7. Malayalam ☐
8. Marathi ☐ 9. Oriya ☐ 10. Punjabi ☐ 11. Sanskrit ☐ 12. Sindhi ☐ 13. Tamil ☐ 14. Telugu ☐
15. Urdu ☐ 16. English ☐ 17. Konkani ☐ 18. Bhutia ☐ 19. Manipuri ☐ 20. Mizo ☐ 21. Nepali ☐
22. Lepcha ☐ 23. Rajasthani ☐ 88. Others (specify)..... 99. Unknown ☐

10. Cultural group *

* Only for North East HBSRs

1. Ahom ☐	2. Aimol ☐	3. Anal ☐	4. Boro ☐	5. Bhutias ☐	6. Bru ☐
7. Chakma ☐	8. Chamars ☐	9. Chiru ☐	10. Chothe ☐	11. Deuri ☐	12. Gangte ☐
13. Gangte ☐	14. Hmar ☐	15. Kachari ☐	16 . Koet ☐	17. Khongsai ☐	18. Koch ☐
19. Kom purum ☐	20. Kuki ☐	21. Lam kang ☐	22. Lengmei ☐	23. Lepchas ☐	24. Mao ☐
25. Mara ☐	26. Maram ☐	27. Maria ☐	28. Maring ☐	29. Meitei ☐	30. Miri ☐
31. Mishimi ☐	32. Mishing ☐	33. Mizo ☐	34. Monsang ☐	35. Moran ☐	36. Moyon ☐
37. Nepalese ☐	38. Paite ☐	39. Paomei ☐	40. Pawih ☐	41. Rabha ☐	42. Raj Bangshi ☐
43. Rongmei ☐	44. Simte ☐	45. Tangkhul ☐	46. Tarao ☐	47. Teli ☐	48. Thangal ☐
49. Waiphei ☐	50. Zemei ☐	51. Zou ☐	52. Dimacha ☐	53. Bishnupriya ☐	54. Naga ☐
55. Adi ☐	56. Brahmin ☐	57. Jogi ☐	58. Kalita ☐	59. Kayastha ☐	60. Koibarta ☐
61. Marwari ☐	62. Muttock ☐	63. Nocte ☐	64. Tea-tribe ☐	65. Tiwa/Lalung ☐	66. Monpa ☐
67. Sherdukpen ☐	68. Aka ☐	69. Miji ☐	70. Nyishi ☐	71. Galo ☐	72. Tagin ☐
73. Hill Miri ☐	74. Apatani ☐	75. Khampti ☐	76. Tangsa ☐	77. Wangcho ☐	78. Singpho ☐
88. Others, Specify ☐	99. Unknown ☐				

II. DIAGNOSIS OF STROKE

11.1 Patient last known or seen well — Date ☐☐☐☐☐☐☐☐ Time ☐☐ : ☐☐

11.2 Date of onset of stroke — Date ☐☐☐☐☐☐☐☐ Time ☐☐ : ☐☐

11.3 Is it a wake-up stroke (recognition of first symptoms of stroke)? — 1. Yes 2.No ☐

11.4 Symptoms noticed at onset:
1. Weakness/paresis ☐ 2. Dysphasia/aphasia ☐
3. Altered level of consciousness ☐ 8. Others, specify.....

11.5 Date of recognition of first stroke symptoms/ signs by medical professional — Date ☐☐☐☐☐☐ Time ☐☐ : ☐☐

11.6 From where did the patient come to reach the reporting hospital for treatment of their stroke? ☐
1. Home 2. Other place of stroke onset
3. Outpatient healthcare setting 4. Inpatient health care setting
5. Other departments within reporting hospital
8. Others, specify .....
9. Unknown

11.7 Date and time of arrival at reporting institution — Date ☐☐☐☐☐☐ Time ☐☐ : ☐☐

12. Date of diagnosis of stroke at the reporting institution : — Date ☐☐☐☐☐☐

13. Diagnosis or History of recent TIA? — 1. Yes 2. No ☐
Date ☐☐☐☐☐☐

14. Clinical Information

14.1 Critical Clinical Findings at RI

a) Unilateral or bilateral motor impairment (including lack of coordination)	☐
b) Unilateral or bilateral sensory impairment	☐
c) Aphasia/dysphasia (non-fluent speech)	☐
d) Hemianopia (half-sided impairment of visual fields)	☐

e) Forced gaze (conjugate deviation)	☐
f) Apraxia	☐
g) Ataxia	☐
h) Perception deficit	☐
i) None	☐

14.2 Other clinical features

a) Dizziness, vertigo	☐
b) Localized headache	☐
c) Blurred vision of both eyes	☐
d) Diplopia	☐
e) Dysarthria (slurred speech)	☐
f) Impaired cognitive function (including confusion)	☐
g) Impaired consciousness	☐
h) Seizures	☐
i) Dysphagia	☐

15.1 Stroke severity score at admission at Reporting Institution

NIHSSS (0-42) ☐

a) Level of consciousness(0-3)	☐
b) LOC Questions(0-2)	☐
c) LOC Commands(0-2)	☐
d) Best gaze(0-2)	☐
e) Visual fields(0-3)	☐
f) Facial palsy(0-3)	☐
g) Motor arm (0-4) h) Motor leg(0-4)	☐ ☐
i) Limb ataxia(0-2)	☐
j) Sensory(0-2)	☐
k) Best language(0-3)	☐
l) Dysarthria(0-2)	☐
m) Extinction and inattention(0-2)	

15.2 Status of the subject prior to occurrence of stroke

Pre Morbid Modified Rankin Scale (0-6) ☐

Symptoms	Score
a) Patient doesn't have any symptoms	☐
b) Patient is able to carry out all usual duties and activities without any assistance	☐
c) Patient can look after own affairs without assistance	☐
d) Patient requires some assistance in doing activities and can walk by himself or herself without any support	☐
e) Patient needs assistance for walking and attending own needs	☐
f) Patient is bedridden/incontinent and requires constant care	☐

16. Diagnostic procedure | 1. Yes 2. No | Imaging date | Time | Imaging findings

1. First CT brain ☐ ☐☐☐☐☐☐ ☐☐ ☐☐ .....
2. MRI-brain ☐ ☐☐☐☐☐☐ ☐☐ ☐☐ .....
3. CT-Angio ☐
4. CT-Perfusion ☐
5. MRI-Angio ☐
6. Carotid ultrasound ☐
7. ECG ☐
8. Transthoracic echocardiogram (TTE) ☐
9. Transesopagheal Echo, Holter ☐

88. Others, specify .....

99. Unknown ☐

17. CT/MRI imaging done at Reporting Institution — 1. Yes 2. No ☐

Date ☐☐☐☐☐☐

17.1 Imaging time at Reporting Institution (time of registration to imaging time at reporting Institution) — 1. <0-45 min 2. ≥45 min to 3 hours 3. >3 to ≤ 6 hours 4. > 6 hours to ≤ 24 hours 5. >24 hours ☐

18. Basis of diagnosis (Select all applicable) — 1. Clinical ☐ 2. CT ☐ 3. MRI ☐

8. Others, specify.....

19. Type of stroke ☐

1. Ischemic
2. Intracerebral haemorrhage
3. Subarachnoid Haemorrhage
4. Venous stroke
5. Undetermined type

20. TOAST CRITERIA (for acute ischemic stroke)

1. Large-artery atherosclerosis ☐
2. Cardioembolism ☐
   i. Rheumatic Valvular
   ii. Non - Rheumatic Valvular
   iii. Non - valvular
   iv. CAD ☐
3. Small-artery occlusion (lacunae) ☐
4. Stroke of other determined etiology ☐
5. Stroke of undetermined etiology ☐
   i. Patient extensively evaluated
   ii. Patient not evaluated
   iii. Patient with two competing aetiologies

21. Type of intra cerebral haemorrhage stroke — 1. Primary 2. Secondary ☐

22. Final diagnosis (in words) .....

.....

23. ICD-10 description ☐ ICD -10 code (loaded automatically) I ☐☐.☐

III. RISK FACTORS AND CO-MORBID CONDITIONS

24. Underlying diseases or co-morbid conditions

	1.Yes/2. No/ 9.Unknown	Duration (completed months)	
a) Previous Stroke	☐	☐☐☐☐	
b) Previous TIA (anytime in the past)	☐	☐☐☐☐	
c) Hypertension	☐	☐☐☐☐	Newly detected at admission ☐
d) DM	☐	☐☐☐☐	Newly detected at admission ☐
e) AF	☐	☐☐☐☐	Newly detected at admission ☐
f) Carotid stenosis	☐	☐☐☐☐	
g) Myocardial Infarction	☐	☐☐☐☐	
h) Ischemic Heart Disease (other than Atherosclerotic MI)	☐	☐☐☐☐	
i) Valvular heart Disease	☐	☐☐☐☐	
1.Rheumatic Heart Disease	☐	☐☐☐☐	
2.Non Rheumatic Heart Disease	☐	☐☐☐☐	
j) Valve Prosthesis	☐	☐☐☐☐	
k) Heart Failure	☐	☐☐☐☐	
l) Peripheral Arterial Disease	☐	☐☐☐☐	
m) Chronic Kidney Disease	☐	☐☐☐☐	
n) Anemia	☐	Haemoglobin: ☐☐☐ g/Dl or ☐☐☐ mmol/L	
o) Hypercholesterolemia	☐	☐☐☐☐	
p) Hyper homocysteinenemia	☐	☐☐☐☐	
q) Other:			
1……	☐	☐☐☐☐	
2……	☐	☐☐☐☐	
3……	☐	☐☐☐☐	

25. Other risks / conditions (current or history of) 1. Yes / 2. No / 9.Unknown

a) Family History of Stroke	☐
b) Tobacco smoking	☐
c) Smokeless tobacco use	☐
d) Alcohol use	☐
e) Drug Abuse	☐
f) Pregnancy or within 6 weeks after a delivery or termination of pregnancy?	☐
g) Hormone replacement Therapy / Hormonal drug use	☐
h) Migraine	☐
i) Sickle Cell disease	☐
j) HIV infection	☐

Level of BMI:

k) Height ☐ l) Weight ☐

m) BMI ☐ 1. Underweight 2. Normal 3. Overweight 4. Obese ☐

n) Others, specify……..

IV. TREATMENT DETAILS

26. Treatment status before onset of stroke 1.Yes 2.No 9.Unknown Duration in years

a) Antiplatelets_____ ☐ ☐
b) Anti-hypertensive drugs ☐ ☐
c) Lipid lowering drugs ☐ ☐
d) Anti-Diabetic agents ☐ ☐
e) Others……

26.1 Medications taken for this episode of stroke, prior to admission to Reporting Institution: 1. Yes 2. No 9. Unknown ☐

26.2 Antiplatelet
a) Aspirin ☐
b) Aspirin/dipyridamole ☐
c) Clopidogrel ☐
d) Others……

26.3 Anticoagulant
a) Heparin IV ☐
b) Full dose LMW heparin ☐
c) Warfarin ☐
d) Newer oral Anti-coagulant ☐
e) Others……

26.4 Thrombolytic treatment?
a) IV tPA ☐
b) IA tPA ☐
c) Mechanical Thrombectomy ☐

26.5 Antidiabetics ☐ **26.6** Anti Hypertensives ☐ **26.**7 Lipid lowering agents /Statins ☐

27. Thrombolytic treatment at reporting institution

27.1 Was Thrombolytic treatment given? 1.Yes 2. No ☐

1. IV tPA 2. IV Tenecteplase 3. Mechanical thrombectomy ☐
8. Others, specify……9. Unknown

27.2 Time of initiating thrombolytic treatment after symptom onset Date: ☐☐☐☐☐☐ Time ☐☐ : ☐☐

27.3 Reasons for not receiving Thrombolysis 1. Yes /2. No/ 9. Unknown

a) Delay in arrival to hospital ☐
b) Delay in the imaging time ☐
c) Diabetes mellitus with h/o previous ischemic stroke ☐
d) Onset of symptoms unknown to decide on treatment initiation ☐
e) SBP > 185 or DBP > 110 mmHg ☐
f) Glucose < 50 or > 400 mg/dl ☐
g) Stroke severity – NIHSS ≥ 22 ☐
h) Suspicion of subarachnoid haemorrhage ☐
i) CT findings of major infarct signs - > 50 % involvement of MCA territory ☐
j) Seizure at onset ☐
k) Recent surgery/trauma (<15 days) ☐
l) Recent intracranial or spinal surgery, head trauma(<3 months) ☐
m) History of intracranial hemorrhage/brain aneurysm/vascular malformation/brain tumor ☐
n) Active internal bleeding (<22 days) ☐
o) Platelets <100,000/PTT> 40 sec after heparin use/ PT > 15 or INR > 1.7/known bleeding diathesis ☐
p) Left heart thrombus ☐
q) Increased risk of bleeding ☐
r) Severe comorbid diseases or condition ☐
s) Stroke –rapidly improving ☐
t) Others, specify…….

27.4 CT done after 24 hours after Thrombolysis ☐

27.5 Patient developed complications due to Thrombolysis: ☐

a) None ☐
b) Asymptomatic Intracerebral Haemorrhage (ICH) within 36 hours ☐
c) Symptomatic ICH within 36 hours (< 36 hours) of thrombolysis ☐
d) Life threatening, serious systemic hemorrhage within 36 hours of thrombolysis ☐
e) Other serious complications.....

28. Other pharmacologic treatment

28.1 Name the medications received and time of initiation after stroke onset while in hospital?

	1.Yes / 2.No/ 9.Unknown	When was it initiated after stroke onset? 1.within 24 hours 2. 24 hours to 48 hours 3.After 48 hours
a) Antiplatelet Name……	☐	☐
b) Anti-coagulants	☐	☐
c) Anti-hypertensive drugs	☐	☐
d) Lipid lowering drugs	☐	☐
e) Anti-Diabetic agents	☐	☐

29. Surgical/interventional treatment

	1.Yes / 2. No	Time of intervention after stroke onset(in hours)
a) Hemicraniectomy	☐	☐☐
b) Suboccipital craniectomy	☐	☐☐
c) Hematoma evacuation	☐	☐☐
d) Carotid artery endarterectomy	☐	☐☐
e) Carotid stenting	☐	☐☐
f) Endovascular coiling	☐	☐☐

g) Any other……..

30. Non- medical test / management

Swallowing test:

30.1 Has the ability to swallow been tested within 24hours of admission to RI? 1. Yes 2. No 3. Not examined due to patient's state 4. Don't know ☐

30.2 Did patient have dysphagia 1.Yes 2.No ☐

30.3 If patient had dysphagia, whether he/ she was put on nasogastric tube feeds? 1.Yes 2. No ☐

30.4 Did the patient receive any of the following therapies while in hospital?

	1. Yes /2. No/ 9. Unknown	Explain
a) Swallowing management	☐	……
b) Occupational therapy	☐	……
c) Physiotherapy	☐	……
d) Speech therapy	☐	……
e) Bladder care	☐	……
f) Deep vein thrombosis prophylaxis	☐	……

31. Course during hospital stay

31.1 Did the patient deteriorate during hospitalisation 1.Developed new stroke event 2. Complications developed during hospitalisation 3.No ☐

31.2 If option 1, what is the type of stroke? 1. Ischemic 2. Intracerebral haemorrhage 3. Subarachnoid Haemorrhage 4. Venous stroke 5. Undetermined type ☐

31.3 Final Diagnosis: .....

31.4 ICD-10 description: ☐ ICD -10 code (loaded automatically) I ☐☐.☐

31.5 Date of new stroke event: ☐☐☐☐☐☐☐☐

31.6 If option 2, what are the complication during hospitalisation?

Nature of complication	1.Yes 2. No 9. Unknown
a) Intracerebral hemorrhage due to antithrombotic therapy	☐
b) Progression of current stroke(in terms of expansion /extension of stroke)	☐
c) Cardiac event, Specify.....	☐
d) Seizures	☐
e) Pneumonia	☐
f) Urinary Tract Infection	☐
g) Decubitus ulcer	☐
h) Deep Venous Thrombosis	☐
i) Pulmonary Embolism	☐
j) Fall	☐
k) Renal Failure	☐
l) Post stroke depression	☐
m) Any other psychiatric illness	☐
n) Others, specify.....	

V. DISCHARGE INFORMATION

32. Date of discharge ☐☐☐☐☐☐

33. How many days was the patient admitted in the hospital? ☐☐

34. Vital status at discharge 1. Alive 2. Dead 9. Unknown ☐

35. Functional Status at discharge (Modified Rankin scale at discharge)

Status (Modified Rankin scale)	☐
Symptoms	Score
a) Patient doesn't have any symptoms	☐
b) Patient is able to carry out all usual duties and activities without any assistance	☐
c) Patient can look after own affairs without assistance	☐
d) Patient requires some assistance in doing activities and can walk by himself or herself without any support	☐
e) Patient needs assistance for walking and attending own needs	☐
f) Patient is bedridden/incontinent and requires constant care	☐
g) Patient is dead	☐

36. Pharmacologic medication at discharge 1. Yes 2. No 9.Unknown

a) Antihypertensives ☐
b) Antiplatelets ☐
c) Anticoagulants ☐
d) Statins ☐
e) Antidiabetics ☐
f) Others .....

37. Counselling regarding management at discharge 1. Yes 2. No 9.Unknown

a) Counselling for regular follow up ☐
b) Counselling for compliance of medication ☐

c) Smoking cessation counselling ☐
d) Smokeless tobacco cessation counselling ☐
e) Counselling to abstain alcohol ☐
f) Counselling to abstain from drugs ☐
g) Advice on rehabilitation services advice ☐
h) Stroke education ☐

VI. FOLLOW UP

38. Follow-up — 1. At day 28 after onset of stroke ☐ — 2. At 3 months after onset of stroke ☐

38.1 Due date of follow-up : ☐☐☐☐☐☐☐☐

38.2 Actual date of follow-up : ☐☐☐☐☐☐☐☐

38.3 Method of follow-up: ☐

1. Hospital visit 2. By post
3. By telephone 4. By house visit
8. Others, specify.....
9. Unknown

39. Vital status

1. Alive 2.Dead ☐

40. Functional Status (Modified Ranking scale)

Status (Modified Ranking scale) Symptoms	Score		
a) Patient doesn't have any symptoms		☐	☐
b) Patient is able to carry out all usual duties and activities without any assistance		☐	☐
c) Patient can look after own affairs without assistance		☐	☐
d) Patient requires some assistance in doing activities and can walk by himself or herself without any support		☐	☐
e) Patient needs assistance for walking and attending own needs		☐	☐
f) Patient is bedridden/incontinent and requires constant care		☐	☐
g) Patient is dead		☐	☐

VII. DETAILS OF DEATH

41. If dead , Date of death ☐☐☐☐☐☐☐☐ ☐☐☐☐☐☐☐☐

42. Cause of Death information available (check boxes)

1. Death Certificate ☐
2. Medical Records ☐
3. Verbal autopsy ☐
4. Not available ☐
9. Unknown ☐

43. Cause of death

1. Related to stroke ☐
2. Not related to stroke ☐
8. Others, specify..... ☐
9. Unknown

43.1 Cause of death from MCCD	……	……
Immediate	……	……
Underlying /Antecedent cause	……	……
Other contributing conditions		

VIII. MATCHING WITH PBSR:

44. Matching death with PBSR record:
Incidence Registration Number

45. Name of person completing the form .....

46. Date of completion of form

47. Signature .....

Fields marked in blue are highly recommended.