



# CASE REPORT FORM

for the Ean NEuro-covid ReGistrY

CRF version 2.0 beta



## HOW TO READ

Radio button

This is a radio button. Only single selection is possible within one group. A radio button group has one column in exports.

Checkbox

This is a checkbox. Multiple selections within one group are possible. Each checkbox has its own column in exports.



Numerical (0.0 - 100.0 %)

This is a textbox. The darker box tells you which type of data is expected. Depending on the type additional information can be min and max values, decimal precision, units and expected formats for dates, times and decimals.

# DAY 0 - BASELINE

Visit date

Date (MM/dd/yyyy)

Data entry is

- Prospective
- Retrospective

## Identification

Site of visit

- Hospital (Ward/ICU)
- Emergency Room
- Outpatient service
- Other:

Text

Reason for neurological assessment

- Consultation
- Other:

Text

Date of admission

Date (MM/dd/yyyy)

## Demographics & History

Patient's height

Numerical (1 - 250 cm)

- Unknown

Patient's weight

Numerical (1 - 400 kg)

Unknown

Current smoker

Yes

No

Unknown

Source of COVID-19 contact

Occupation

Family member

Social

Travel

Unknown

Other:

Text

Date of COVID-19 symptom onset

Date (MM/dd/yyyy)

Variant of COVID-19 infection

Alpha (B.1.1.7)

Beta (B.1.351)

Gamma (P.1)

Delta (B.1.617.2)

My (B.1.621)

Eta (B.1.525)

Theta (P.3)

Kappa (B.1.617.1)

Lambda (C.37)

Iota (B.1.526)

Zeta (P.2)

Unknown

Other:

Text

Final COVID-19 status (final diagnosis)

Suspected

Confirmed

- PCR negative
- PCR positive (oropharyngeal AND/OR serum AND/OR CSF)
- Antibodies positive
- Other:

Text

Was the patient vaccinated?

- Yes
- No

If Yes:  
Number of vaccination doses

Numerical (1 - \*)

If Yes:  
Vaccine of last dose

- Spikevax (Moderna)
- Comirnaty (Pfizer/BioNTech)
- Janssen (Johnson & Johnson)
- Vaxzevria (Oxford/AstraZeneca)
- Covishield (Serum Institute of India)
- Covilo (Sinopharm)
- CoronaVac (Sinovac)
- Unknown
- Other:

Text

If Yes:  
Date of last dose

Date (MM/dd/yyyy)

## Comorbidities in history

Any comorbidity with impact on patients perceived health?

- Yes
- No
- Unknown

Arterial hypertension

- Yes
- No
- Unknown

Diabetes

- Type 1
- Type 2
- Unknown
- No
- Other:

Text

Cardiovascular Disease

- Yes
- No
- Unknown

Chronic kidney disease

- Yes
- No
- Unknown

Chronic liver disease

- Yes
- No
- Unknown

Chronic pulmonary disease

- Yes
- No
- Unknown

Anemia

- Yes
- No
- Unknown

Cancer

- Yes
- No
- Unknown

Immunosuppressed state

- Yes
- No
- Unknown

Other non-neurological comorbidities

- Yes, specify:
- No
- Unknown

Text

Premorbid modified Rankin Scale score (mRS)

  

Numerical (0 - 5)

Another complication

- Yes, specify:
- No
- Unknown

  

Text

Any neurological disease with impact on patient's health?

- Dementia
- Parkinson's disease
- Stroke: ICH, ischemic stroke, TIA
- Multiple sclerosis
- Motor neuron disease
- Neuromuscular disorder
- Neuropathy
- No
- Unknown
- Other:

  

Text

Complications

- Yes
- No
- Unknown

Dyspnea

- Yes
- No
- Unknown

Pneumonia

- Yes
- No
- Unknown

Cardiovascular

- Yes
- No
- Unknown

Renal insufficiency/dialysis

Yes  
 No  
 Unknown

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Coagulation disorder /Disseminated intravascular coagulation

Yes  
 No  
 Unknown

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Refractory shock

Yes  
 No  
 Unknown

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Extra-Corporeal Membrane Oxygenation (ECMO)

Yes  
 No  
 Unknown

---

Mechanical ventilation

Yes  
 No  
 Unknown

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## New Neurological Findings

Neurological findings at visit

Yes  
 No

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If new neurological findings:  
Neurological findings date

Date (MM/dd/yyyy)

---

If new neurological findings:  
Headache

Yes, not COVID assoc  
 Yes, likely COVID assoc  
 Yes, unknown COVID assoc  
 No  
 Unknown

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If new neurological findings:  
Hyposmia/Hypogeusia

Yes, not COVID assoc  
 Yes, likely COVID assoc  
 Yes, unknown COVID assoc  
 No  
 Unknown

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If new neurological findings:  
Dysautonomia

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Vertigo

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Myalgia

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Sleep disturbances

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Sleepiness/Hypersomnia

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Cognitive impairment

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Dysexecutive syndrome

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
-

If new neurological findings:  
Hyperactive delirium

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Hypoactive delirium/acute encephalopathy

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Stupor/coma

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Syncope

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Seizures/status epilepticus

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Meningitis/encephalitis

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
Stroke

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
-

If new neurological findings:  
**Tremor**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Chorea**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Dystonia**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Myoclonus**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Dyskinesia**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Parkinsonism**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
- 

If new neurological findings:  
**Ataxia**

- Yes, not COVID assoc
  - Yes, likely COVID assoc
  - Yes, unknown COVID assoc
  - No
  - Unknown
-

If new neurological findings:  
Spinal cord disorder

- Yes, not COVID assoc
- Yes, likely COVID assoc
- Yes, unknown COVID assoc
- No
- Unknown

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If new neurological findings:  
Peripheral neuropathy

- Yes, not COVID assoc
- Yes, likely COVID assoc
- Yes, unknown COVID assoc
- No
- Unknown

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If new neurological findings:  
Other new neurological findings

- Yes, not COVID assoc:
- Yes, likely COVID assoc:
- Yes, unknown COVID assoc
- No
- Unknown

Text

## Additional Diagnostic Tools

CSF performed

- Yes
- No
- Unknown

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If Yes:  
Did CSF show abnormality signs?

- Yes, not COVID assoc
- Yes, likely COVID assoc
- Yes, unknown COVID assoc
- No
- Unknown

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CT/MRI

- Yes
  - No
  - Unknown
-

If Yes:  
Did CT/MRI show abnormality signs?

- Yes, not COVID assoc
- Yes, likely COVID assoc
- Yes, unknown COVID assoc
- No
- Unknown

## Outcome

Was the patient admitted to the hospital?

- Yes
- No
- Unknown

Was the patient admitted to the ICU?

- Yes
- No
- Unknown

Modified Rankin Scale score (mRS)  
(Discharge/visit)

Numerical (0 - 6)

If mRS = 6:  
Date of death

Date (MM/dd/yyyy)

If mRS = 6:  
Autopsy performed

- Yes
- No
- Unknown

If mRS < 6:  
Date of discharge

Date (MM/dd/yyyy)

## Neurocritical Care Questionnaire Supplementary

NCC additional values

- Yes
- No

If NCC done:  
Patient's ethnicity

- Hispanic or Latino
- Not Hispanic or Latino
- Unknown
- Not reported
- Other:

Text

If NCC done:  
Empiric COVID 19 treatment

- None
- Hydroxychloroquine
- Zithromax
- H+Z combo
- IVIG
- Remdesivir
- lopinavir/ritonavir
- Other:

Text

If NCC done:  
Pre-Existing Code Status

- Full
- DNR
- DNI
- CMO
- Other

If NCC done:  
ATII-RA

- Yes
- No

If NCC done:  
Corticosteroids

- Yes
- No

If NCC done:  
Other immunosuppressives

- Yes
- No

If NCC done:  
Plegia/paralysis

- Yes, specify:
- No

Text

If NCC done:  
Aphasia

- Yes
- No

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If NCC done:  
Abnormal tone

- Yes, specify:
- No

Text

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If NCC done:  
Movement disorder

- Tremor
- Stiffness
- Change in facial expression
- Disturbances of dexterity
- Micrographia
- Weakness
- Dystonia
- Ambulatory/Axial Difficulties - Freezing
- Ambulatory/Axial Difficulties - Lack of arm swing
- Ambulatory/Axial Difficulties - Leg dragging
- Ambulatory/Axial Difficulties - Shuffling of gait
- Ambulatory/Axial Difficulties - Postural imbalance
- Ambulatory/Axial Difficulties - Falls
- Ambulatory/Axial Difficulties - Slowness of gait
- Ambulatory/Axial Difficulties - Stooped posture
- Ambulatory/Axial Difficulties - Other abnormality of posture or gait
- Other:

Text

If NCC done:  
Abnormal brainstem reflexes

- Abnormal corneal
- Abnormal pupillary
- Abnormal cough
- Abnormal gag
- No abnormal reflexes
- Other:

Text

If NCC done:  
Did the patient exhibit or report new sensory symptoms?

- Yes
- No

If NCC done:  
Best GCS

Numerical (1 - 15)

If NCC done:  
Baseline Oxygen Saturation (SpO2)

Numerical (0.000 - 100.000)

If NCC done:  
Baseline respiratory rate

Numerical (0 - 50)

If NCC done:  
Baseline arterial blood gas Ph

Numerical (6.00 - 8.00)

If NCC done:  
Baseline arterial blood gas PaO2

Numerical (10.00 - 200.00)

If NCC done:  
Baseline arterial blood gas PaCO2

Numerical (10.00 - 100.00)

If NCC done:  
Baseline arterial blood gas HCO3

Numerical (10.00 - 40.00)

If NCC done:  
Baseline arterial blood gas O2 sat

Numerical (40 - 100)

If NCC done:  
Pre-intubation Oxygen Saturation (SPO2)

Numerical (0.000 - 100.000)

If NCC done:  
Pre-intubation Respiratory Rate

Numerical (0 - 50)

If NCC done:  
Pre-intubation arterial blood gas Ph

Numerical (6.00 - 8.00)



If NCC done: Pre-intubation arterial blood gas PaO2	<input type="text"/> Numerical (10.00 - 200.00)
If NCC done: Pre-intubation arterial blood gas PaCO2	<input type="text"/> Numerical (10.00 - 100.00)
If NCC done: Pre-intubation arterial blood gas HCO3	<input type="text"/> Numerical (10.00 - 40.00)
If NCC done: Pre-intubation arterial blood gas O2 sat	<input type="text"/> Numerical (40 - 100)
If NCC done: Days on Mechanical Ventilation	<input type="text"/> Numerical (0 - 60 days)
If NCC done: WBC on presentation	<input type="text"/> Numerical (0.00 - 50.00 × 10 <sup>9</sup> /L)
If NCC done: Lymph on presentation	<input type="text"/> Numerical (0.00 - 50.00 × 10 <sup>9</sup> /L)
If NCC done: Neuroimaging type	<input type="checkbox"/> CT scan head <input type="checkbox"/> MRI head <input type="checkbox"/> MRI spine <input type="checkbox"/> None <input type="checkbox"/> Other: <input type="text"/> Text
If NCC done: ICU LOS	<input type="text"/> Numerical (0 - 100 days)
If NCC done: Hospital LOS	<input type="text"/> Numerical (0 - 100 days)

If NCC done:  
Discharge disposition

- Home
- Nursing home/SNF
- LTACH
- Hospice
- Acute rehab
- Subacute rehab
- Other:

Text

Finally

Any comment

Text