Impact of COVID-19 Pandemic on Ophthalmic Presentations to an Australian Outer Metropolitan and Rural Emergency Department: A Retrospective Comparative Study

King Fai Calvin Leung MD MMed1, Mojtaba Golzan PhD2, Chaminda Egodage FACEM1, Simon Rodda FACEM3, Richard Cracknell FACEM1, Peter Macken FRANZCO4, Shweta Kaushik FRANZCO PhD2,5

*1Department of Emergency Medicine, Campbelltown Hospital, Campbelltown, New South Wales, Australia*

*2Vision Science group, Graduate School of Health (GSH), University of Technology Sydney (UTS), Chippendale, New South Wales, Australia*

*3Department of Emergency Medicine, Bowral and District Hospital, Bowral, New South Wales, Australia*

*4Department of Ophthalmology, Bowral and District Hospital, Bowral, New South Wales, Australia*

*5Department of Ophthalmology, Campbelltown Hospital, Campbelltown, New South Wales, Australia*

**Corresponding author**: Dr. King Fai Calvin Leung

**Postal Address**: Department of Emergency Medicine

Campbelltown Hospital

Therry Road, Campbelltown, NSW 2560

**Email Address**: kfcalvinl@gmail.com

**Telephone Number**: +61 406 321 619

Supplementary Table 1.List of discharge diagnoses organised by triage categoryfor patients presenting to Campbelltown Hospital and Bowral and District Hospital Emergency Departments from March 1st to May 31st in 2019 and 2020.

|  |  |
| --- | --- |
| Campbelltown Hospital | Bowral and District Hospital |
|  | **2019** | **2020** |  | **2019** | **2020** |
| Triage Category | **Diagnosis** | **n** | **Diagnosis** | **n** | **Triage Category** | **Diagnosis** | **n** | **Diagnosis** | **n** |
| 2 | Cerebrovascular accidentChemical injury to corneaCorneal abrasionPeriorbital cellulitisVisual disturbance | 13111 | Cerebrovascular accidentChemical injury to corneaCorneal abrasionDrooping eyelidHomonymous hemianopiaRetinal artery occlusion | 121111 | **2** | Low vision, one eyeSubconjunctival haemorrhage | 11 | Acute conjunctivitisHypertensionMultiple trauma | 111 |
| 3 | Acute conjunctivitisAllergic dermatitis of eyelidFacial painBlunt injury of eyeCerebrovascular accidentChemical burn of eyelid AND/OR periocular areaChemical injury to corneaConjunctival oedemaCorneal abrasionCorneal ulcerDid not wait for treatmentDischarge from eyeDisorder of eyeEye painEye swellingEyeball injuryFacial burnForeign bodyHSV dendritic keratitisLaceration of eyelidPeriorbital cellulitisStyeSuperficial injury of eye regionUveitisVisual disturbanceVitreous haemorrhageWelder's flash | 3112113131431311131131111011 | Acute conjunctivitisAllergic reactionBenign intracranial hypertensionBlunt injury of eyeBurn of eyeChemical injury to corneaCorneal abrasionCorneal ulcerDid not wait for treatmentDiplopiaDischarge from eyeDisorder of eyelidEye disorderEye massEye painForeign bodyLaceration of eyeLaceration of eyelidLow vision, one eyePalpitationsPeriorbital cellulitisRetinal artery occlusionVisual disturbanceWelder's flash | 512317722111111321113111 | **3** | Abscess of eyelidAcute conjunctivitisAcute orbital inflammationAllergic conjunctivitisBlepharitisBlunt injury of eyeCerebrovascular accidentChemical injury to corneaCorneal abrasionDid not wait for treatmentDischarging woundDisorder of eyeEye painEye symptomFlu-like illnessForeign bodyHeadacheInjury of eye regionPeriorbital cellulitisTemporal giant cell arteritisVisual disturbanceWelder's flash | 1211111142111113113121 | Allergic conjunctivitisChemical injury to corneaDid not wait for treatmentEye disorderEye painEye swellingForeign bodyInjury of scleraLaceration of eye regionLaceration of eyelidPanic attackVitreous haemorrhage | 111111311111 |
| 4 | Acute conjunctivitisAllergic conjunctivitisAllergic dermatitis of eyelidBlepharitisBlunt injury of eyeBurn of eyeChemical burn of eyelid AND/OR periocular areaChemical injury to corneaCorneal abrasionCorneal ulcerDid not wait for treatmentDiplopiaDischarge from eyeEye painEye swellingEyeball injuryForeign bodyHeadacheInfected chalazionLaceration of eyelidLeft against medical adviceOrbital cellulitisPeriorbital cellulitisPostoperative complicationRed eyeStyeSubconjunctival haemorrhageVictim of physical assaultViral illnessVisual disturbance | 811241131212211931281142151441113 | AbscessAcute conjunctivitisAllergic conjunctivitisAllergic reactionBlunt injury of eyeBurn of eyeChalazionChemical injury to corneaContact lens corneal oedemaCorneal abrasionCorneal ulcerDid not wait for treatmentDisorder of eyeEye painEye swellingFacial injuryForeign bodyHeadacheHerpes zoster ophthalmicusHyperglycaemiaLaceration of eyelidOrbital cellulitisFacial painPeriorbital cellulitisRed eyeScleritisSixth cranial nerve injuryStyeSubconjunctival haemorrhageSuperficial injury of eye regionVisual disturbanceWelder's flash | 11032111218261311341113111061111133 | **4** | Acute conjunctivitisBlepharitisBlunt injury of eyeChemical injury to corneaClosed fracture of orbital floor (blow-out)Conjunctival injuryCorneal abrasionDacryocystitisDid not wait for treatmentEye painForeign bodyHeadacheKeratitisLaceration of eye regionPeriorbital cellulitisRed eyeSubconjunctival haemorrhageTemporal giant cell arteritisTick biteVisual disturbanceWelder's flash | 4122126183201211311111 | Acute conjunctivitisAngioedemaBlepharitisBlunt injury of eyeChemical injury to corneaCorneal abrasionCorneal ulcerDid not wait for treatmentEye painEye swellingEye symptomForeign bodyFuruncle of eyelidHeadacheInjury of scleraLaceration of eye regionLaceration of eyelidPeriorbital cellulitisPhotokeratitisPterygiumRed eyeStyeSubconjunctival haemorrhageVisual disturbance | 21126102732220111112111131 |
| 5 | Acute conjunctivitisAllergic conjunctivitisBlepharitisBlunt injury of eyeCorneal abrasionCorneal ulcerDid not wait for treatmentDischarge from eyeDry eyesForeign bodyHeadacheLaceration of eyelidStyeViral illness | 211221121181421 | Acute conjunctivitisAllergic reactionBurn of eyeChemical injury to corneaCorneal abrasionCorneal ulcerDid not wait for treatmentEye painEye symptomForeign bodyHyphaemaPeriorbital cellulitisRed eyeRetinal tearScleritisStyeSuperficial injury of eye regionUveitis | 4111419812112211111 | **5** | Did not wait for treatmentEye painForeign body | 111 | Chemical injury to corneaCorneal abrasionDid not wait for treatmentDisorder of lacrimal systemForeign bodyPeriorbital cellulitisRed eye | 1431613 |