

vIRus In Summer

Gepubliceerd: 04-08-2021 Laatste bijgewerkt: 18-08-2022

It is expected to see a shift with respect to the prevalence of HMPV infection compared to previous cohorts.

Ethische beoordeling	Positief advies
Status	Werving gestart
Type aandoening	-
Onderzoekstype	Observationeel onderzoek, zonder invasieve metingen

Samenvatting

ID

NL-OMON26351

Bron

NTR

Verkorte titel

IRIS

Aandoening

Human metapneumovirus infection

Ondersteuning

Primaire sponsor: Dr. E. R. Heddema, Department of microbiology Zuyderland Medisch Centrum, Heerlen

Overige ondersteuning: No fundings needed.

Onderzoeksproduct en/of interventie

Uitkomstmaten

Primaire uitkomstmaten

Gain insight into likely shifts in incidence of HMPV, both in children and adults, between 2016 and 2021.

Toelichting onderzoek

Achtergrond van het onderzoek

Background: Human metapneumovirus (HMPV) is a virus belonging to the Paramyxoviridae family and has been known since 2001. Symptoms may include wheezing, increased breath effort, and a severe cough. The virus is a known causative agent of pneumonia in both children and the elderly, immunocompromised and it can cause exacerbations in patients with COPD. Studies by our group showed that it can be associated with significant mortality and that the clinical picture in adults is very similar to COVID-19. However, there is an important difference with COVID-19: while COVID-19 shows itself as an erratic pandemic with high peaks and deep drops in incidence, HMPV continued to behave as a purely seasonal virus until 2020 with an annual high incidence in the spring and complete decline in the summer. However, in 2021, after a year of COVID-19 measures, there is evidence that HMPV incidence shifted from spring, in which it was now barely detected, to summer.

Purpose: Through this retrospective subject study, we want to gain insight into suspected shifts in incidence of HMPV, both in children and adults. We also want to gain insight into whether it is 1 cluster of introduction or whether there are multiple genotypes circulating. Finally, we want to compare clinical outcomes of adult patients in June/July 2021 with the previously collected historical cohort, as well as differences between children and adults in June/July 2021.

Methods: This retrospective cohort analysis will look at the incidence of HMPV infection in patients who were admitted to Zuyderland Medical Center between 1/1/16 and 1/8/21. Both children and adults will be included for this purpose.

The cohort of patients admitted between 1/6/21 and 1/8/21 will be studied in more detail. In these cases genotyping of HMPV will be performed and clinical outcomes of patients will be collected. Genotyping will be performed in close collaboration with the Erasmus University. The main clinical outcomes that will be observed are: mortality, ICU admission and length of hospital stay.

Doel van het onderzoek

It is expected to see a shift with respect to the prevalence of HMPV infection compared to previous cohorts.

Onderzoeksopzet

T0= hospital admission T1= 30 days after hospital discharge

Contactpersonen

Publiek

Zuyderland Medical Centre
Christopher Kivit

088 - 459 7777

Wetenschappelijk

Zuyderland Medical Centre
Christopher Kivit

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Deelname eisen

Belangrijkste voorwaarden om deel te mogen nemen (Inclusiecriteria)

Patients presented at Zuyderland Medical Center with HMPV infection, as determined by nasopharyngeal swab in which the PCR was positive for HMPV. These included both children and adults.

Belangrijkste redenen om niet deel te kunnen nemen (Exclusiecriteria)

Absence of nasopharyngeal swab. No informed consent.

Onderzoeksopzet

Opzet

Type:	Observationeel onderzoek, zonder invasieve metingen
Onderzoeksmodel:	Anders
Toewijzing:	N.v.t. / één studie arm
Blinding:	Open / niet geblindeerd
Controle:	N.v.t. / onbekend

Deelname

Nederland	
Status:	Werving gestart
(Verwachte) startdatum:	04-08-2021
Aantal proefpersonen:	534
Type:	Verwachte startdatum

Voornemen beschikbaar stellen Individuele Patiënten Data (IPD)

Wordt de data na het onderzoek gedeeld: Nog niet bepaald

Ethische beoordeling

Positief advies	
Datum:	04-08-2021
Soort:	Eerste indiening

Registraties

Opgevolgd door onderstaande (mogelijk meer actuele) registratie

Geen registraties gevonden.

Andere (mogelijk minder actuele) registraties in dit register

Geen registraties gevonden.

In overige registers

Register	ID
NTR-new	NL9648
Ander register	METC Z : METCZ20210130

Resultaten