

Management of opioids and persistent pain (MOPP) study

Submission date 28/04/2022	Recruitment status No longer recruiting	<input checked="" type="checkbox"/> Prospectively registered <input type="checkbox"/> Protocol
Registration date 13/05/2022	Overall study status Completed	<input checked="" type="checkbox"/> Statistical analysis plan <input type="checkbox"/> Results
Last Edited 22/05/2025	Condition category Signs and Symptoms	<input type="checkbox"/> Individual participant data <input type="checkbox"/> Record updated in last year

Plain English summary of protocol

Background and study aims

Researchers are working with GP practices on a research study to develop new ways to improve care for patients with long-term pain (also called persistent or chronic pain) who are regularly prescribed opioid medicines. Opioid medicines (also known as 'opioids') are a group of drugs that are commonly prescribed for pain. Morphine is the best-known opioid medicine and codeine, tramadol and oxycodone are opioids too. Sometimes opioids are mixed with paracetamol, for example, co-codamol, co-dydramol and tramacet. Opioids may be prescribed as tablets, capsules, liquids, or patches. Guidelines say opioid medicines should be reviewed regularly, but this doesn't always happen and many patients with long-term pain struggle to get the help they need. Pain reviews may be conducted by a GP or by another healthcare professional, for example a nurse or a pharmacist in the general practice team. GP practices are invited to take part in this study because the general practice team includes a practice pharmacist, who works in the practice for at least one half-day per week. Practice pharmacists have done specialist training to provide expert support on medicines and are becoming more involved in reviewing patients on regular medicines for long-term health problems.

Who can participate?

Adults aged over 18 years in participating GP practices with persistent pain prescribed any opioid analgesic for at least 6 months and issued an opioid prescription in the last 2 months.

What does the study involve?

In the MOPP study, the researchers will collect health information on over 800 people who are prescribed opioid medicines for long-term pain, from lots of different GP practices in England. The practices may invite patients for a pain review with the practice pharmacist. Patients who agree to take part in the MOPP study and then go on to attend a pain review with their practice pharmacist will, if they give permission to be contacted again, be invited to take part in a related study called MOPP-2, to find out more about their experiences of the pain review. The results of this study will help improve how pain reviews for patients taking opioid medicines are conducted in the future.

What are the possible benefits and risks of participating?

Whilst there are no direct benefits from taking part in this study, it is hoped that the results of

the study will help patients with long-term pain in the future. This study is part of a programme of research that aims to improve the care offered by GP practices to patients using opioids for long-term pain.

Where is the study run from?
Keele University (UK)

When is the study starting and how long is it expected to run for?
May 2021 to April 2025

Who is funding the study?
National Institute for Health Research (NIHR) (UK)

Who is the main contact?
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Contact information

Type(s)
Scientific

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Additional identifiers

Integrated Research Application System (IRAS)
305174

Central Portfolio Management System (CPMS)
52261

Study information

Scientific Title
Improving care for patients living with persistent non-cancer pain and taking opioid medicines long-term: a multicentre cluster randomised controlled trial of proactive clinical review led by practice pharmacists in primary care: the PROMPPT trial

Acronym
PROMPPT

Study objectives

To determine, in patients prescribed opioids long-term (≥ 6 months) for persistent non-cancer pain, whether providing the PROMPPT intervention is more likely to reduce opioid use, without increasing pain/pain-related interference, at 12-month follow-up compared with the usual primary care review of patients who are prescribed opioids long term for persistent non-cancer pain.

Ethics approval required

Old ethics approval format

Ethics approval(s)

Approved 30/03/2022, North East - Newcastle & North Tyneside 2 Research Ethics Committee (NHS BT Blood Donor Centre, Holland Drive, Newcastle upon Tyne, Tyne and Wear, NE2 4NQ, UK; +44 (0)207 1048091; newcastlenorthtyneside2.rec@hra.nhs.uk), ref: 22/NE/0044

Study design

Randomized; Interventional; Design type: Process of Care, Complex Intervention

Primary study design

Interventional

Study type(s)

Treatment

Health condition(s) or problem(s) studied

Persistent non-cancer pain

Interventions

Participating practices will identify adults 18 years and over who have been prescribed any opioid medicines for persistent non-cancer pain continuously for 6 months or longer and have been issued a prescription in the last 12 months from electronic practice records using a search and report provided by Keele Clinical Trials Unit. An authorised person at the GP practice will then screen the list of patients identified according to the study inclusion/exclusion criteria, excluding those that are ineligible. Participating General Practices will be allocated at random either to deliver the PROMPPT intervention or continue with usual care arrangements for reviewing patients prescribed opioids for persistent pain. Practice pharmacists delivering PROMPPT will be independent prescribers and will complete specific training to deliver the PROMPPT intervention. Eligible patients will then be sent an invitation from the GP practice, either by SMS text message (if they have registered a mobile phone with the practice that can accept SMS messages) or by post inviting them to participate in a questionnaire study (patient facing name: Management of Opioids & Persistent Pain (MOPP) study) The invitation text will include a link to information about the study, an online consent form to take part and an online baseline questionnaire. The postal invitation letter will include a paper copy of the study information, a paper consent form and the baseline questionnaire. All potential participants receiving an SMS text invitation will be sent a reminder text approximately 2 to 3 days after the initial text, which will include information on how to contact Keele CTU if they are unable to complete the questionnaire online or would like to receive a paper copy. Response rates to text and postal invitations will be monitored and, if recruitment is low a further invitation will be sent by post to non-responders. Participating patients in GP practices randomised to the intervention arm will receive the PROMPPT intervention.

PROMPPT is a practice pharmacist-led intervention incorporating proactive review for patients who have been taking opioids regularly for at least 6 months and aims to reduce opioids, where appropriate, and to support patients to live well with persistent pain. Eligible patients who have consented to take part in the MOPP questionnaire study will be invited to schedule a PROMPPT pain review with the pharmacist working at their GP surgery. Patients in control arm practices will receive usual primary care arrangements for reviewing patients on long-term opioids for persistent pain, which are known to be variable.

Follow-up:

Clinical outcome data will be collected via participant completed questionnaires (online or postal according to patient preference) at 3, 6, and 12 months from baseline questionnaire. Standard Keele CTU procedures will be followed to maximise follow-up at all timepoints. This includes electronic / postal reminders for non-responders after 2 and 4 weeks and contact by telephone for minimum data collection (MDC) after 6 weeks.

Practice-level outcome data:

The researchers will extract and analyse pseudonymised data from the electronic health records of participating practices on relevant prescriptions among adults aged ≥ 18 years who do not have a coded cancer diagnosis. Data will be extracted for the period from 3 months before the date the first participant in the practice was recruited to the date 12 months after the last participant in the practice was recruited. This pseudonymised prescribing data will be used to assess any changes in the proportion of adult patients without a coded cancer diagnosis who are prescribed opioids, non-opioid analgesics, gabapentinoids, antidepressants, benzodiazepines and Z-drugs.

Process evaluation - MOPP-2 study patients:

Participants from clusters in the intervention arm who consented to being contacted about a future related research study and subsequently attend a PROMPPT review will be invited to participate in the process evaluation (MOPP-2 study). Following the initial consultation with the practice pharmacist, participants will be sent a MOPP-2 recruitment pack, via email or post depending on patient preference, by Keele CTU. The MOPP-2 recruitment pack will include an invitation email/letter, Participant Information Leaflet, Acceptability Questionnaire (including consent form), an Interview Reply Slip and a prepaid envelope (for those opting for paper completion). Participants may choose to consent to any, all or none of these options. Additionally, participants from clusters in the intervention arm who consented to being contacted about a future related research study but decline a PROMPPT review will be invited to participate in an interview to explore the reasons for declining a pain review with their practice pharmacist. Participants who decline a PROMPPT review will be sent a decliners recruitment pack, including an invitation email/letter, Participant Information Leaflet, an Interview Reply Slip and a prepaid envelope (for those opting for paper completion). Patient participants from clusters in the intervention arm, will be interviewed after attending at least one appointment with the practice pharmacist. The interviews will be based on semi-structured topic guides developed in association with our PPI group. Patient participants from clusters in the intervention arm, who decline a PROMPPT review and accept an invitation to speak to a researcher, will be interviewed using a semi-structured topic guide that will include questions to explore reasons for declining. A sample of patients from clusters in the intervention arm will also be asked if they wish to consent to have their pain review with the Practice Pharmacist audio recorded. If they are interested then they will be sent an audio recording PIL and consent form to complete.

Clinicians:

Clinicians (GPs and practice pharmacists) working at the identified practices, will also be invited to participate in the process evaluation. Participant Information Leaflet and reply forms will be provided. The practice pharmacist from each participating practice in the intervention arm will be asked to consent to observation/audio-recording of a sample of PROMPPT consultations (with patient consent) and to an interview. GPs at each practice in the intervention arm will also be asked to consent to an interview. A sample of practice pharmacists and GPs from practices in the control arm will also be invited to participate and consent to an interview. Practice Pharmacists and GPs will be required to return a signed interview reply form and a signed observation/audio-recording consent form (practice pharmacists in control clusters only) to Keele CTU during recruitment of the practice.

Clinical champions:

Pharmacist clinical champions will be employed to mentor practice pharmacists that deliver PROMPPT. PROMPPT clinical champions will be invited to take part in an interview and will be provided with an information sheet and consent to take part. The interview will explore their experiences of mentoring practice pharmacists during the delivery of PROMPPT.

Pen sub-study (SWAT)

The researchers will undertake an embedded trial to investigate the effectiveness of including a pen incentive with the 3-, 6- and 12-month follow-up questionnaires when a pen will be sent, on retention of participants. Participants will be sent a postal questionnaire from Keele CTU. Participants will be randomly allocated to receive a pen with the CTU/university logo, or no pen. This sub-study should not represent any further burden to participants.

Intervention Type

Other

Primary outcome(s)

1. Reduction in opioid use (binary outcome defined as a participant who achieved at least a 25% reduction in opioid use from their baseline Yes/No), measured by self-report questionnaire at baseline, 3, 6 and 12 months
2. Non-inferiority of the Brief Pain Inventory total score, measured by self-report questionnaire at baseline, 3, 6 and 12 months

Key secondary outcome(s)

1. Pain severity/interference measured using the Brief Pain Inventory (BPI) Total Score at 3 and 6 months self-report questionnaire
2. Pain severity, assessed using the BPI pain severity subscale (four items; current, least, worst, and average pain rated on 0-10 scale), at baseline, 3, 6 and 12 months self-report questionnaire
3. Pain-related interference, assessed using the BPI interference subscale (seven items assessing interference with general activity, walking, sleep, work, mood, enjoyment of life and relationships rated on a 0-10 scale) at baseline, 3, 6 and 12 months self-report questionnaire
4. Opioid use (mean daily MED) at 3, 6 and 12 months. A self-reported pain medicines use questionnaire (developed for this research programme, tested in the feasibility study and refined in light of the findings) will collect data on opioid use (prescribed and non-prescribed) during the previous week (7 days). Incomplete data on prescribed medicines will be obtained, where possible, by telephone or from the electronic prescribing record. Mean daily MED will be calculated using published conversion factors.
5. Non-opioid pain-related medicines use, assessed from the self-reported pain medicines use questionnaire at baseline, 3, 6 and 12 months. Incomplete data on prescribed medicines will be

- obtained, where possible, by telephone or from the electronic prescribing record.
6. Presence and severity of opioid-related side-effects, assessed from a self-reported side effects checklist (developed for this research programme from existing measures and tested in a feasibility study) at baseline, 3, 6 and 12 months self-report questionnaire.
 7. Depressive symptoms assessed using the Patient Health Questionnaire Depression Scale (PHQ-8) at baseline, 3, 6 and 12 months self-report
 8. Anxiety symptoms assessed using the Generalised Anxiety Assessment (GAD-7) at baseline, 3, 6 and 12 months self-report
 9. Confidence to cope with pain (pain self-efficacy) using the Pain Self-Efficacy Questionnaire (PSEQ) assessed at baseline, 3, 6 and 12 months
 10. Health-related quality of life assessed using the EQ-5D5L at baseline, 3, 6 and 12 months

GP practice-level secondary outcomes:

Practice-level prescribing of opioids, non-opioid analgesics, potentially sedating medicines commonly prescribed for patients with persistent pain (specifically antidepressants, benzodiazepines (e.g. diazepam) and Z-drugs (zopiclone, zolpidem)) will be assessed from electronic prescribing records at baseline and 12 months to determine:

1. The proportion of adult patients registered with the practice, aged ≥ 18 years and without a code for a cancer diagnosis, who have been prescribed a weak, intermediate or strong opioid analgesic, based on a published categorisation for prescribed analgesics in primary care.
2. The proportion of adult patients registered with the practice, aged ≥ 18 years and without a code for a cancer diagnosis, who have been prescribed each of the following classes of medicines: paracetamol, topical pain treatments, systemic NSAIDs, nefopam, gabapentinoids, antidepressants, benzodiazepines and Z-drugs.

Health economic outcomes:

Within-trial resource use data will be collected regarding the delivery of the PROMPPT intervention, including practice pharmacist appointments (face to face and telephone) and GP input. Resource use data on persistent pain-related healthcare resource use and any opioid-related side effects will be collected at 3, 6 and 12 months via participant questionnaires

Process evaluation:

The process evaluation aims to better understand how and why PROMPPT was effective or ineffective. The key processes of interest are response of clusters, delivery of PROMPPT and response of patients. Mixed quantitative and qualitative data will yield an understanding about:

1. How PROMPPT was implemented and how clinicians integrate and adopt PROMPPT-related work into existing systems and everyday work
2. Fidelity of intervention delivery
3. How patients respond to and engage with PROMPPT

Data will be integrated in order to generate more detailed and comprehensive findings

Completion date

10/04/2025

Eligibility

Key inclusion criteria

1. Adult patients aged ≥ 18 years
2. Prescribed any opioid analgesic (defined as any opioid or opioid/paracetamol combination)

analgesic from sections 4.7.2 and 4.7.1 British National Formulary [BNF]) for chronic non-cancer pain continuously for ≥ 6 months

3. Prescription issued within the previous 2 months

Participant type(s)

Patient

Healthy volunteers allowed

No

Age group

Adult

Lower age limit

18 years

Sex

All

Total final enrolment

907

Key exclusion criteria

1. Patients being treated for acute pain (self-limiting pain, for example after injury or surgery), pain associated with cancer and patients with terminal illness (life expectancy < 6 months)
2. Vulnerable patients (e.g. severe mental illness, learning difficulties, dementia)
3. Patients currently receiving treatment for substance misuse

Date of first enrolment

21/06/2022

Date of final enrolment

19/01/2024

Locations

Countries of recruitment

United Kingdom

Study participating centre

Not provided at time of registration

United Kingdom

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Sponsor information

Organisation
Keele University

ROR
<https://ror.org/00340yn33>

Funder(s)

Funder type
Government

Funder Name
NIHR Central Commissioning Facility (CCF); Grant Codes: RP-PG-0617-20005

Results and Publications

Individual participant data (IPD) sharing plan

Any subsequent requests for access to the data from anyone outside of Keele Clinical Trials Unit (e.g. collaboration, joint publication, data sharing requests from publishers) will follow Keele University's standard operating procedure. The anonymised datasets generated during and/or analysed during the current study will be available upon request from medicine.
datasharing@keele.ac.uk. A data request form is required to be completed and must outline the type of data to be obtained, the reason for obtaining this data (research question/objective), the timing for when the data is required to be available (start date/end date).

IPD sharing plan summary

Available on request

Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
HRA research summary			28/06/2023	No	No
Statistical Analysis Plan	version 1.0		22/05/2025	No	No
Study website	Study website	11/11/2025	11/11/2025	No	Yes