Randomly select 8 care homes in those who agreed to join the trial

Cluster-randomly assign care homes into control or experimental condition

Eligible participants will be identified based on inclusion and exclusion criteria:
Over the age of 65; dementia and pain-related diagnoses; communication impairment. Participants from the same care homes will be placed into their homes’ corresponding group (i.e. either experimental or control condition)

Pre-Study

Control Condition

Experimental Condition

Collect participants’ general information
- Demographic information and medical history
- Cognitive impairment level by *C-MMSE
- Verbal fluency by *M-FVFT

Baseline assessment (4 weeks)
- Daily Medication Quantification Scales III score collected every 7 days (by *RA)
- Daily types, number, hours of each non-phonological intervention collected every 7 days (by *RA)
- *C-PAINAD score once per week (by Independent Pain Observer)

Workshop about pain assessment and management for older people
- Introduction of Observational Pain Management Protocol
- Practising use of the Protocol

Workshop about pain assessment and management for older people with dementia
- Use Observational Pain Management Protocol to guide the pain management for all participants
- Complete the *C-PAINAD daily (by care homes’ staff)

Study period 12 weeks
Continue usual care home pain management strategy

Study period 12 weeks (Protocol implementation)

Outcome assessments (12 weeks)
- Daily Medication Quantification Scales III score collected every 7 days (by *RA)
- Daily types, number, hours of each non-phonological intervention collected every 7 days (by *RA)
- *C-PAINAD score once a week (by Independent Pain Observer)

*C-MMSE: Cantonese-Mini Mental State Examination  *C-PAINAD: Chinese-Pain Assessment IN Advanced Dementia  *M-FVFT: Modified Fuld Verbal Fluency Test  *RA: Research Assistant