Reducing Inappropriate Use of Antipsychotics in Nursing Homes

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Medicare Quality Improvement
Presentation Outline/Questions To Think On

► Why is this initiative important?
► What resources are there to address this concern?
► What are my next steps?
Polling Question #1

Who is represented in the room today?

1. Nursing Home Administrators
2. Director of Nursing / Nursing Leadership
3. MDS Coordinators / other nursing
4. Physicians
5. Pharmacy
6. Industry / Corporations
7. Other
# Polling Question #2

**Who has already started work on this initiative?**

<table>
<thead>
<tr>
<th>Color</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>GREEN</strong></td>
<td>Have a team identified and meetings begun</td>
</tr>
<tr>
<td><strong>YELLOW</strong></td>
<td>Committed but not yet started</td>
</tr>
<tr>
<td><strong>RED</strong></td>
<td>Interested by not sure this is for us</td>
</tr>
</tbody>
</table>
Polling Question #3

Who has a Medical Director already interested in this initiative?

- **GREEN**: Have had discussions and is on board
- **YELLOW**: Not sure of their interest
- **RED**: May be reluctant to work on this
Polling Question #4

Who has access to pharmacy data for this initiative?

**GREEN**  Have seen the data

**YELLOW**  I think I have it but have not seen it

**RED**  I don’t think / am not sure if we get this
Population by Age: 1900 – 2050

Most people with dementia do not complain of memory loss.

Cognitively impaired older persons are at ↑ risk for accidents, delirium, medical non-adherence, and disability.
The Prevalence of Alzheimer’s Disease

- 4 million in U.S. currently – 14 million in U.S. by 2050
- Life expectancy of 8 -10 years after symptoms begin
**DSM-IV Diagnostic Criteria for Alzheimer's Disease**

- Development of cognitive deficits manifested by:
  - Impaired memory *and*
  - Aphasia, apraxia, agnosia, disturbed executive function

- Significantly impaired social, occupational function

- Gradual onset, continuing decline

- Not due to CNS or other physical conditions (e.g., PD, delirium)

- Not due to an Axis I disorder (e.g., schizophrenia)
Psychotic Symptoms

- As many as 80% - 90% of patients with dementia develop at least one psychotic symptom or behavioral disturbance over the course of their illness

- Behavioral disturbances or psychotic symptoms in dementia often precipitate nursing home placement

- Disturbances are potentially treatable, so it is vital to recognize them early
CLINICAL FEATURES: AGITATION (1 of 2)

► Reflects loss of ability to modulate behavior in a socially acceptable way

► May involve verbal outbursts, physical aggression, resistance to bathing or other care needs, and restless motor activity such as pacing or rocking

► Often occurs concomitantly with psychotic symptoms such as paranoia, delusional thinking or hallucinations
Caregivers, both professional and family, may use the word *agitation* to describe a variety of behaviors and psychologic symptoms.

The clinician must consider agitation to be a nonspecific complaint and pursue further history of the problem.

Overt resistance to care is most often seen in later stages of dementia, but it may be a first sign of incipient cognitive decline in earlier stages as well.
Triggers

- Caregiver/Staff Behaviors
- Depression
- Acute & Chronic Disease
- Psychosis
- Sensory Deficits
- Medications
- Environmental
Behavioral Symptoms

- Rejection of Care
- Yelling/Calling Out
- Irritability
- Agitation/Apathy
- Hoarding
- Wandering/Pacing
Modifiable Causes of Behavioral Symptoms

► **Medical / Physical**: PAIN, infection, hunger, thirst, hypoxia, sleep disturbance, constipation

► **Medications**: that cause anti-cholinergic reactions (including psychosis), delirium, depression, sleep disturbance

► **Communication**: Inability to communicate perceptions or expectations
Modifiable Causes of Behavioral Symptoms

- **Environmental**: Noise, physical barriers, visual barriers, temperature
- **Cognitive impairment**: Lack of understanding (agnosia), inability to communicate perceptions or expectations
- **Psychiatric conditions**: Depression, Anxiety, Psychosis
Off Label Antipsychotic Medications
Pharmacological Treatment

- In 2005 the FDA issued a black box warning on antipsychotics and the increased risk of cardiovascular mortality when used in the elderly for behavioral symptoms in dementia.
- Antipsychotics are not FDA approved for behavioral symptoms in dementia.
- No psychotropic medications are FDA approved for behavioral symptoms.
- There is some evidence supporting cautious use of antipsychotics at low doses.
~22% of antipsychotic prescriptions in nursing homes are problematic per Centers for Medicare and Medicaid Services (CMS) standards

<table>
<thead>
<tr>
<th>Problem per CMS standards</th>
<th>% of claims</th>
</tr>
</thead>
<tbody>
<tr>
<td>Excessive dose</td>
<td>10.4%</td>
</tr>
<tr>
<td>Excessive duration</td>
<td>9.4%</td>
</tr>
<tr>
<td>Without adequate indication</td>
<td>8.0%</td>
</tr>
<tr>
<td>Without adequate monitoring</td>
<td>7.7%</td>
</tr>
<tr>
<td>In the presence of adverse effects that indicate the dose should be reduced or discontinued</td>
<td>4.7%</td>
</tr>
</tbody>
</table>

http://oig.hhs.gov/oei/reports/oei-07-08-00150.pdf
### Number of Medicare Claims and Amount for Each Atypical Antipsychotic Drug (January 1 through June 30, 2007)

<table>
<thead>
<tr>
<th>Generic Drug Name</th>
<th>Claims</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quetiapine</td>
<td>627,661</td>
<td>$85,847,131</td>
</tr>
<tr>
<td>Risperidone</td>
<td>536,600</td>
<td>$87,161,507</td>
</tr>
<tr>
<td>Olanzapine</td>
<td>356,695</td>
<td>$94,055,067</td>
</tr>
<tr>
<td>Aripiprazole</td>
<td>83,756</td>
<td>$29,565,887</td>
</tr>
<tr>
<td>Ziprasidone</td>
<td>44,681</td>
<td>$10,067,477</td>
</tr>
<tr>
<td>Clozapine</td>
<td>27,294</td>
<td>$1,691,718</td>
</tr>
<tr>
<td>Olanzapine/Fluoxetine</td>
<td>1,521</td>
<td>$431,799</td>
</tr>
<tr>
<td>Paliperidone</td>
<td>666</td>
<td>$207,731</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>1,678,874</strong></td>
<td><strong>$309,028,317</strong></td>
</tr>
</tbody>
</table>
# ANTIPSYCHOTIC AGENTS (1 of 3)

selected agents used off-label for treatment of psychosis in dementia

<table>
<thead>
<tr>
<th>Drug</th>
<th>Daily Dose</th>
<th>Adverse Effects</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aripiprazole (Abilify)</td>
<td>5 -15 mg</td>
<td>Mild sedation, mild hypotension</td>
<td>Warning about increased cerebrovascular events in dementia, possible hyperglycemia</td>
</tr>
<tr>
<td>Clozapine (Clozaril)</td>
<td>12.5 - 200 mg</td>
<td>Sedation, hypotension, anticholinergic effects, hyperglycemia, agranulocytosis</td>
<td>Weekly CBC required; poorly tolerated by older adults; reserve for treatment of refractory cases</td>
</tr>
<tr>
<td>Drug</td>
<td>Daily Dose</td>
<td>Adverse Effects</td>
<td>Comments</td>
</tr>
<tr>
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<td>-----------------------------------------------------------</td>
</tr>
<tr>
<td>Olanzapine (Zypraxia)</td>
<td>2.5 - 10 mg</td>
<td>Sedation, falls, gait disturbance</td>
<td>Warning about hyperglycemia and cerebrovascular events in patients with dementia</td>
</tr>
<tr>
<td>Quetiapine (Seroquel)</td>
<td>25 - 200 mg</td>
<td>Sedation, hypotension</td>
<td>Warning about hyperglycemia; ophthalmologic exam recommended every 6 months</td>
</tr>
<tr>
<td>Drug</td>
<td>Daily Dose</td>
<td>Adverse Effects</td>
<td>Comments</td>
</tr>
<tr>
<td>--------------------------</td>
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<td>---------------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Risperidone (Risperdal)</td>
<td>0.5 - 2 mg</td>
<td>Sedation, hypotension, extrapyramidal symptoms with doses &gt; 1 mg/day</td>
<td>Warning about cerebrovascular events in patients with dementia, hyperglycemia warning</td>
</tr>
<tr>
<td>Ziprasidone (Geodon)</td>
<td>40 -160 mg</td>
<td>Higher risk of prolonged QTc interval, hyperglycemia</td>
<td>Little published information on use in older adults</td>
</tr>
</tbody>
</table>
Off-Label Antipsychotics

Distribution of AHCA Member Long Stay Residents on Off-label Antipsychotics

Percent of off-label antipsychotics

Source: AHCA analysis of Brown University Center for Gerontology and Health Care Research data.
Note: Preliminary data. Measure specifications and the target are likely to change. 2009.
Off-Label Anti-Psychotic Use in Georgia LTC

DATA FROM MDS 3.0 provided by AHCA

US Avg. = 23%

Georgia Avg. = 28%
AHCA

- 2011- HHS Inspector General found that 14% of NH residents were prescribed antipsychotics, but eight to 10% were off-label and thus, not for treatment of mental illness.

- Goal - Reduce avoidable antipsychotic use by 15% by 12/31/12 (nationally, 18,400 fewer individuals will receive antipsychotic medications per year).

- Move from 23% to 19.6%
Goal - Reduce avoidable antipsychotic use by 15% by 12/31/12

Move from 28% to an average of 23.8%
Measure #1

**Incidence**: % of individuals who have an antipsychotic drug initiated for an off-label use within the first 90 days of a nursing facility stay (regardless of payer source or length of stay)

**Calculation**:
- # of short-stay individuals (100 or less cumulative days in the facility) with antipsychotic drug use indicated on an MDS assessment in the target quarter
- # of short-stay individuals (100 or less cumulative days in facility) with one or more MDS assessments in the target quarter

**Exclusions**:
1. Antipsychotic use identified on the initial assessment OR
2. Diagnosis of: bipolar or schizophrenia

Measure #2

► **Prevalence**: % of long-stay residents with off-label use of an antipsychotic drug

► **Calculation**:
  – # of long-stay residents (those with >100 cumulative days in the facility) with antipsychotic drug use indicated on one or more MDS assessments in the target quarter
  – # of long-stay residents (those with >100 cumulative days in the facility) with one or more MDS assessments in the target quarter.

► **Exclusions**:
  Diagnosis of bipolar or schizophrenia.

Turn to your neighbor and describe those behaviors occurring in your setting in patients with dementia.
Polling of Behaviors

GREEN  A rare occurrence or seldom drug use

YELLOW Monthly occurrence w/medication use

RED Weekly occurrence w/medication use
Preferred Staff Reaction

- STOP & LISTEN
- What is the Target behavior?
- How often is it occurring & timing
- What are the circumstances?
- What may have precipitated behavior?
- What has already been done to modify the behavior?
Tools to Support Staff Behavior Change

- Resources on AHCA website: [http://www.ahcancal.org/quality_improvement/qualityinitiative/Pages/ResourcesByGoal.aspx#4](http://www.ahcancal.org/quality_improvement/qualityinitiative/Pages/ResourcesByGoal.aspx#4)

- Dementia Beyond Drugs (book) [http://www.healthpropress.com/store/power-29562/](http://www.healthpropress.com/store/power-29562/)

- Improving Antipsychotic Appropriateness in Dementia Patients (IA-ADAPT) [https://www.healthcare.uiowa.edu/igec/IAADAPT](https://www.healthcare.uiowa.edu/igec/IAADAPT)

- Quality of Life Outcomes for People with Alzheimer’s Disease and Related Dementia [https://www.healthcare.uiowa.edu/IGEC/IAAdapt/](https://www.healthcare.uiowa.edu/IGEC/IAAdapt/)
Change in Perspective About Behaviors

**Behavior in “old” language**

- Agitation
- Rummaging or “Shopping”
- Wandering
- Egress or Elopement
- Refusing Personal Care
- Repetitive Crying Out

**New language for behavior**

- Energetic/Assertive
- Seeking
- Exploring
- Assertive / Focused / Showing Initiative
- Cautious
- Assertive
Strategies to Manage Behaviors

- Start with Consistent Assignment
- Sooth the anxiety – determine the cause – (noise, constipation, dehydration, hungry)
- Leave if they are escalating
- Let patient make a call to a family or friend – short list for day or night
- Switch TV or radio to a calming show
Communication Techniques

- Talk slow
- Get their attention
- Listen
- Calm tone
- Yes or no questions
- Orient to task
- Use touch

- Don't argue
- Repeat rephrase and repair
- Smile and laugh
- Reinforce positive moments
- Affirmations
- Use humor
- Watch your language
Alternative Medicine Approaches

- Chamomile tea or milk
- Magnesium 250-500mg
- Familiar or comfort foods
- Essential oils – lavender, rose, rosemary – tiny amounts
- Favorite cologne, aftershave, perfume
- Colored lights – pink, blue, outside sunlight
- Pets
- Small children
- Acupressure / shiatsu / swaddling
- Exercise
- Foot bath, shoulder massage / hydro therapy
- Neutral temperature bath
- Music
F329 - Unnecessary Medications

Victoria L. Walter, Director
Healthcare Facility Regulation/Nursing Home Section
Georgia Department of Community Health
email: vlwalter@dhr.state.ga.us
Getting to Know Your Resident

► Activity – Interview your neighbor and determine what you can about them from the ages 15-25.

► What did you learn that could be helpful if they were now in their 80s living in your nursing home with dementia and become…

The Best Friends™ Approach to Alzheimer’s Care
Reducing Off-label Antipsychotics

Requires Change:

- Systems
- Process
- Personal behavior changes
- Workflow
Potential Impact

- Culture change of family, staff and clinicians
- Fewer accidents and injury rates
- Fewer residents on antipsychotics
- Lower doses of antipsychotics
- Improved staff satisfaction
- Avoid future potential penalties
Strategy - FOCUS

F ind a process to improve
O rganize a team
C larify current knowledge
U nderstand the variation
S elect the process changes
Find a process to improve

- **Identify** a care/service process that is “KEY” to your success
- **Select** the AIM of your improvement
- **Determine** if there is a BEST PRACTICE internally or externally
- **Establish** if there is a POLICY or REGULATION that is prescriptive
Organize a team

► Include Key Stakeholders

– Stakeholders have the most knowledge about the process

– Stakeholders are key to making successful and sustainable improvements
Clarify current knowledge

- Identify how the process is currently taking place (the real practice)
- Generate a Process Map to represent the sequential order of each step
- Collect/Gather Baseline Data about the current process
Understand the variation

- Compare the current process steps to the steps in the process that you would like to model
  - *This could be based on Policy, Regulations or a Best Practice Model*

- Understand the differences between the two practices and determine where non-value added steps exist

- Analyze Baseline Data compared to Best Practice Data if available
Select the process changes

- Using the Baseline Date, determine the improvement actions you need to take
- Prioritize the list through Rank Order of importance
1) Obtain Leadership Commitment – build the will to work on this and develop the buy-in to understand, taking a thoughtful approach, use QA&A (or QAPI) review

2) Convene a local interdisciplinary committee for oversight

3) Review Baseline data – the nation, state, facility data to determine the issue (pull own data, understand the numbers, follow regularly)
   a) Rate of use of antipsychotics for all reasons; rate of off-label use; rate and pattern of PRN use
   b) Behaviors that trigger use of medications
   c) Initial patient list of impacted individuals
4) Assess current practices – i.e., consistent assignment, CNA meetings, environmental assessment, culture change processes, pharmacy processes, Medical Director and staff MD involvement

5) Education of CNAs to increase skills and give new tools

6) After the above – (months into project) – ask CNAs which residents could benefit from this new approach

7) Routine monitoring of facility MDS 3.0 data
Next Steps

► Alliant | GMCF is ready to partner with you

– Identify and tailor educational tools
  • AHCA website, CMS or other videos

– Host webinars
  • Monthly 30-minute educational sessions
  • Monthly 30-minute project tracking and support sessions

– Data interpretation and analysis
  • Assist you in tracking your blinded data
Timeline

June
- Kickoff Workshop
- Collection of baseline data
- Report baseline data

July
- Obtain leadership buy-in
- Identify team members
- Discuss topic at QA&A (QAPI) meetings
- Monthly data monitoring
- Participate in monthly webinar

August
- Discuss project with front-line staff
- Begin educational plan with front-line staff
- Identify processes for improvement – begin PDSA
- Monthly data monitoring
- Participate in monthly webinar
September

- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- Participate in monthly webinar
- Monthly data monitoring and reporting

October

- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- **Begin titration down medications on targeted patients**
- Monthly data monitoring and reporting
- Participate in monthly webinar
- **Attend GHCA Council session**

November

- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- **Continue titration down medications on targeted patients**
- Monthly data monitoring and reporting
- Participate in monthly webinar
- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- **Continue titration down and stop medications on targeted patients**
- Monthly data monitoring and reporting
- Participate in monthly webinar

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**December**

- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- **Continue titration down and stop medications on targeted patients**
- Monthly data monitoring and reporting
- Participate in monthly webinar

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**January**

- Continue educational program with staff
- Identify processes for improvement – begin and revise PDSA
- **Continue titration down and stop medications on targeted patients**
- Monthly data monitoring and reporting
- Participate in monthly webinar

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**Celebrate Improvement!**
In Closing

Questions

Commitment Signing

Photo