A Global Survey Assessing Risk of Opioid Abuse in Chronic Pain Patients: The Importance of Education Across Specialties

Karyn Ruiz-Cordell1, Joanne Nettleship2, Greg Salinas3, Ann Marie DeMatteo1
1Regeneron Pharmaceuticals, Tarrytown, NY, USA; 2Teva Pharmaceuticals, Amsterdam, The Netherlands; 3CE Outcomes, LLC, Birmingham, AL, USA.

Introduction
- Opioid analgesics are widely used for the management of postoperative pain and severe chronic pain due to advanced cancer and other diseases.1
- Substantial differences exist in opioid-prescribing practices across prescriber specialties.2
- Identification of these differences and education of best practices across specialties may help reduce the risk of opioid abuse in patients with chronic pain.

Objectives
- To identify clinical practice gaps, unmet medical education needs, and practice barriers among clinicians who manage patients with chronic pain.
- To compare findings from US clinicians with those in an ex-US cohort (Canada, France, Germany, Italy, Spain, and the UK).

Methods
- An anonymous, modified Delphi technique was used to identify barriers in focus group sessions of clinicians who treat osteoarthritis (OA) and low back pain (LBP).
- Qualitative analyses: US clinicians who treat OA and LBP were invited to participate in two anonymous focus group sessions to identify the most significant barriers to effective management of chronic pain with opioids.
- Quantitative analyses: US and ex-US clinicians were invited to answer a case-vignette survey of four patients.

Results
Qualitative Analysis
- LBP treating clinicians (n=16) considered the potential for opioid abuse to be a more important barrier to effective pain management than OA treating clinicians did (n=17) (Figure 1).
- Focus group participants indicated a need for more proactive education for healthcare providers.

Quantitative Analysis
- A total of 1182 clinicians were surveyed, of whom 402 (34%) were in the US cohort. Medical specialties of respondent clinicians are summarized in Figure 2.

Confidence and Knowledge
- Overall, clinicians in both the US and ex-US cohorts reported very good knowledge of opioid mechanisms of action (4.36 vs 4.34, Likert scale 1-5) and moderate confidence in assessing the risk of opioid abuse (3.56 vs 3.4).
- In the US, anesthesiologists had the highest confidence in assessing opioid abuse risk, whereas orthopedic surgeons and rheumatologists had the lowest (3.95 vs 3.71 and 3.15, respectively). Outside of the USA, neurologists had the highest confidence, whereas orthopedic surgeons had the lowest (3.85 vs 3.90). The differences between these specialties were statistically significant (P<0.05; Figure 3).

Assessment of Risk
- Clinicians in the US tended to use multiple risk assessment tools, whereas those outside the US tended to rely solely on patient factors (Figure 4).
- In both the US and ex-US cohorts, anesthesiologists carried out the most opioid abuse risk assessments, whereas orthopedic surgeons carried out the least.

Timing of Risk Assessment
- US clinicians preferred to assess risk of abuse before prescribing opioids, whereas ex-US clinicians preferred to assess risk after prescribing or when warning signs of abuse occurred (Figure 5).
- Within specialty groups, anesthesiologists in the US and neurologists outside of the US were most likely to assess risk before prescribing opioids.

Conclusions
- A small survey of US clinicians who treat OA (n=17) and LBP (n=19) suggested that the potential for opioid abuse is an important barrier to the effective management of chronic pain.
- A larger survey of clinicians in the US, Canada, and Europe (n=1182) demonstrated that opioid prescribing practices and risk assessment timing differ across specialties. Regardless of geography, clinicians who take a more proactive approach to risk assessment tend to be more confident in prescribing opioids and assessing the risk of abuse.
- These findings have important implications for both professional and patient-focused education. Targeted education of best practices to specific groups of clinicians, along with more proactive discussions with patients with chronic pain and their family members, could help reduce the risk of opioid abuse.

References

Acknowledgments
The authors thank Stephen Harry, PhD (MMH); and George Tiedeman, PhD (MMH), for statistical advice. The authors also thank Dr. Jonathan Halliday for providing feedback on the manuscript.

Disclosures
Karyn Ruiz-Cordell and Joanne Nettleship are employees of Regeneron Pharmaceuticals, Inc. Medical writing assistance was provided by CE Outcomes, LLC, Birmingham, AL, USA, and was funded by TEva Pharmaceuticals, Inc.

Presented at the 17th World Congress on Pain; September 12–16, 2018; Boston, MA, USA.