E-Abstract Book

IUPAC 2025
Kuala Lumpur, Malaysia

IUPAC2025

Kuala Lumpur Convention Centre, Malaysia

53rd IUPAC General Assembly (53GA)
12th - 16th July 2025

50th World Chemistry Congress (50WCC)
14th - 19th July 2025

Organised by:

IUPAC
INTERNATIONAL UNION OF PURE AND APPLIED CHEMISTRY

INSTITUT KIMIA MALAYSIA

Supported by:

Malaysia Convention & Exhibition Bureau

Visit Malaysia 2026 Truly Asia

Meet in Malaysia
BE Greater, Together.

Incorporating LabAsia2025



Chemistry for Sustainable Future

iupac2025.org

Symposium - [Systems Thinking in Chemistry for Sustainability]

Reference ID	Abstract Title	Page
1845	Systems thinking in the chemistry classroom: Training instructors so they can train their students	910
1879	Systems thinking for material stewardship: Implications for chemistry education	911
2034	Systems thinking in the laboratory classroom	912
2074	Exploring renewable feedstocks in the classroom through systems thinking	913
2566	Renewing chemistry pedagogy: Implementing systems thinking in chemistry teacher education	914

Symposium - [Multi-language Dictionary for Chemistry Education]

Reference ID	Abstract Title	Page
1531	Texts in chemistry education: Difficulties in translation	915
1690	Turkish translation of multi-language dictionary of terms in chemistry education	916

Symposium - [CTI Workshop]

Reference ID	Abstract Title	Page
1849	Workshop: How to publish in chemistry teacher international	917

TURKISH TRANSLATION OF MULTI-LANGUAGE DICTIONARY OF TERMS IN CHEMISTRY EDUCATION

Mustafa Sözbilir[a,*], Dilek Teke[a]
[a]*Atatürk University, Kazım Karabekir Faculty of Education, Department of Mathematics and Science Education, Chemistry Education, Erzurum-Türkiye*
[*]*Corresponding author: sozbilir@atauni.edu.tr*

Abstract
Chemistry is a core science with specific terminology. The correct use of terms is important for the correct transfer and understanding of knowledge. A dictionary focusing on terms used in chemistry education research literature is a major deficiency for practitioners and researchers. While there are dictionaries focusing on terms used in chemistry (Somer & Yaşar, 2009) and education (Güneş, 2015), there is no dictionary focusing specifically on terms used in chemistry education literature in Turkish. Therefore, the IUPAC project entitled "Multi-language Dictionary of Terms in Chemistry Education (#2023-031-3-050)" has the potential to fill this gap. The development of this dictionary will be a collaborative effort involving chemistry educators, researchers and experts in the field. The scope of this project includes the production of a dictionary in 16 different languages.

The dictionary has two groups of terms used in chemistry education. The first group of terms are dominated by chemistry content while the second group of terms are coming from pedagogy area. Therefore, it requires a knowledge of both disciplines. This project brought us that there are major problems in this area. Firstly, there is no specific dictionary devoted to chemistry education in Turkish. Secondly, when we translate the terms, we encounter problems finding exact matches. Sometimes, the same English term is translated in different ways in Turkish. This means there is no common term used for anything. On the other hand, there are terms that match with one term in Turkish, while there are several matches in English. Also, there is a limited reference document (e.g. Ayas & Sözbilir, 2017) apart from research papers, in which there is no common language use.

Keywords: Chemistry education, pedagogy, dictionary, translation, Turkish

References

1. Ayas, A., & Sözbilir, M. (Edt) (2017). *Kimya öğretimi: Öğretmen eğitimcileri, öğretmenler ve öğretmen adayları için iyi uygulama örnekleri [Chemistry teaching: Examples of good practices for teacher educators, teachers and student teachers]*. Pegem Akademi
2. Güneş, H. (2015). *Eğitim bilimleri terimleri sözlüğü [Dictionary of educational sciences terms]*. Ütopya Yayınevi.
3. Somer, G. & Yaşar, A., (2009). *Kimya terimleri s*özlüğü *[Dictionary of chemistry terms]*. Türk Dil Kurumları Yayınları.