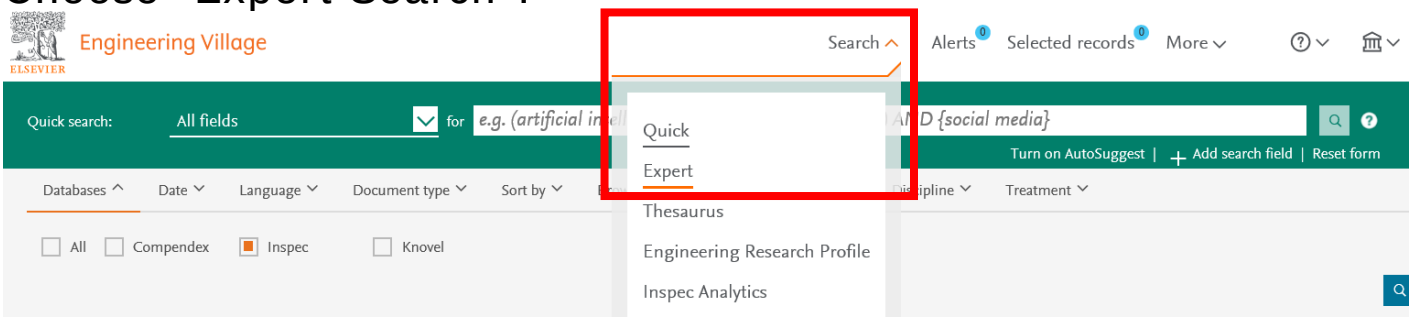
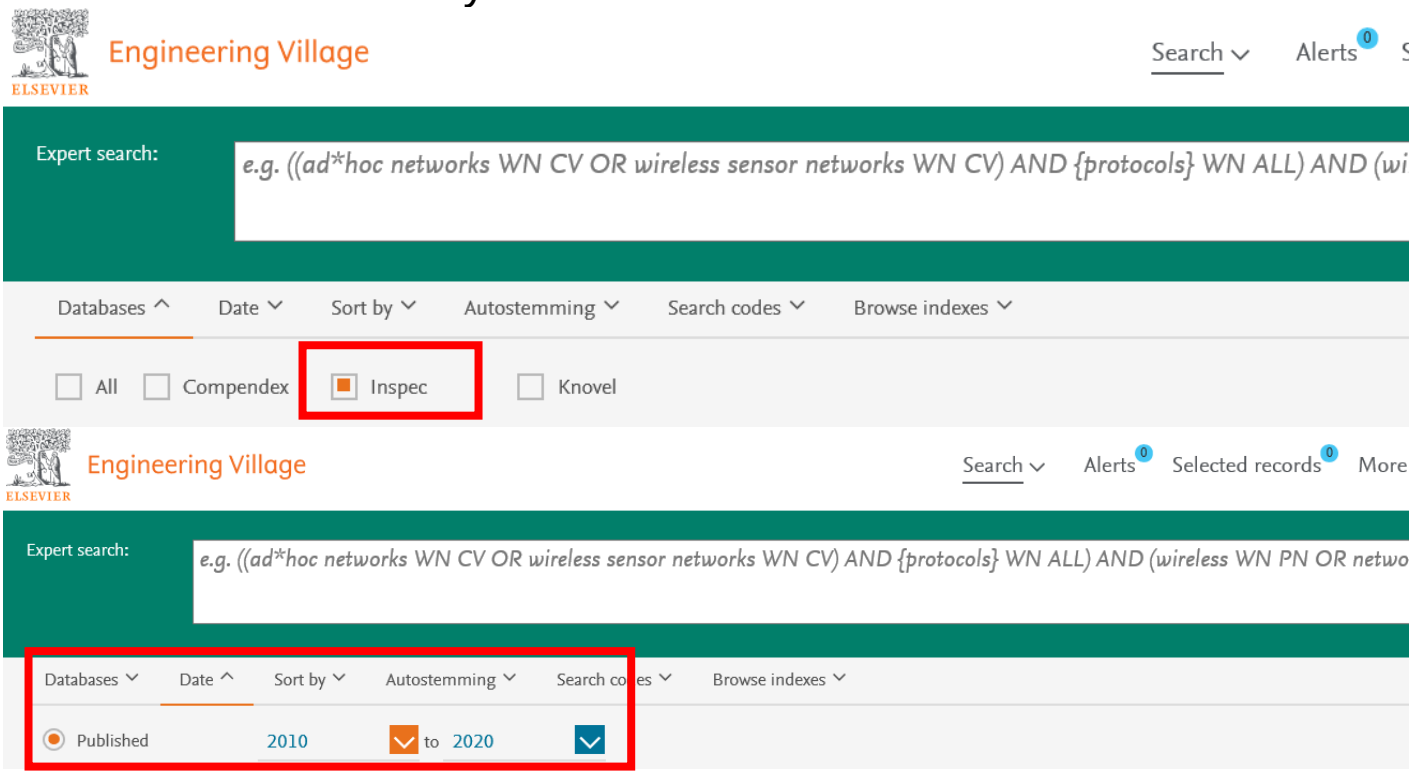
The Inspec database can be found in our Databases list.

Choose “Expert Search”.



Ensure that only the Inspec database is selected and limit the search to the last 10 years.

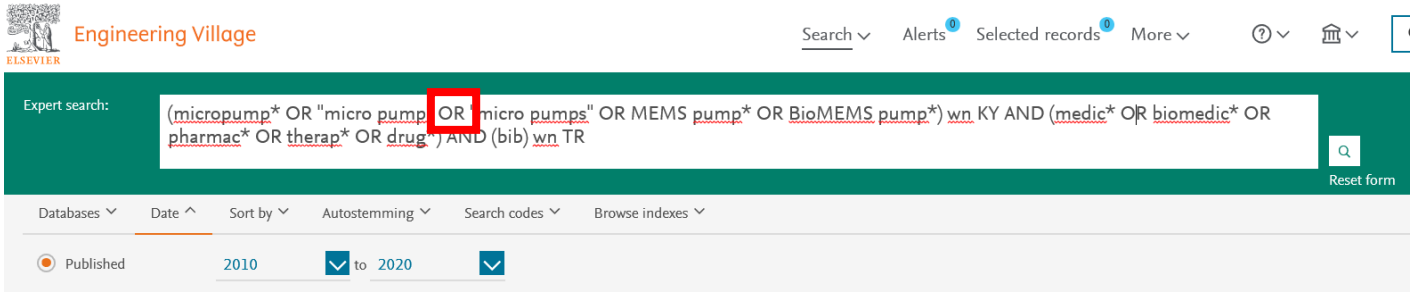


For a literature review search in Inspec, limit the search to **1 or 2 concepts.**

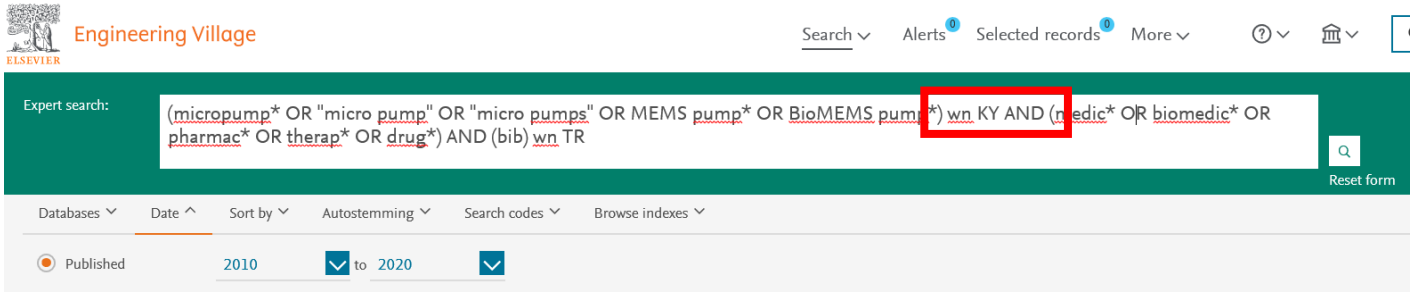
Subject example:
Prototype of a micropump [implanted] for the purpose of anti-epileptic drug delivery.

Concept #1 Micropumps	AND	Concept #2 Medical Fields
Micropump* Micro pump* MEMS pump* BioMEMS pump*	OR	Medic* Biomedic* Pharmac* Therap* Drug*

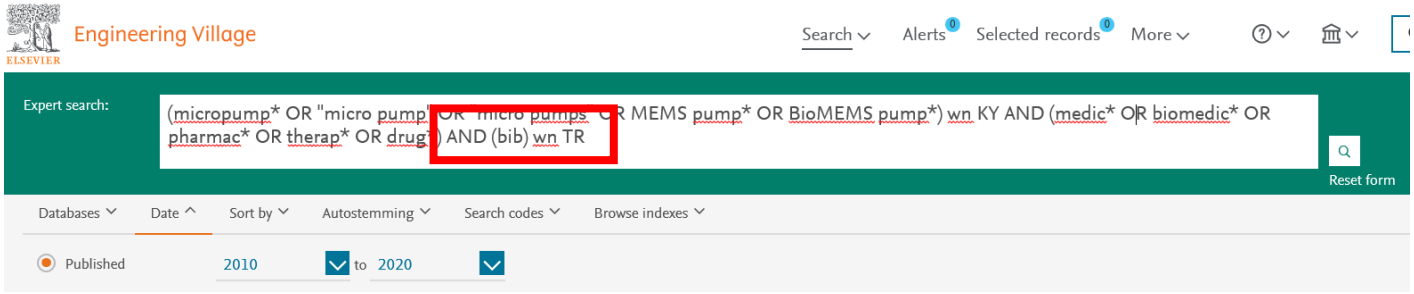
Use OR to combine the words within the same concept. Write each concept in parentheses.



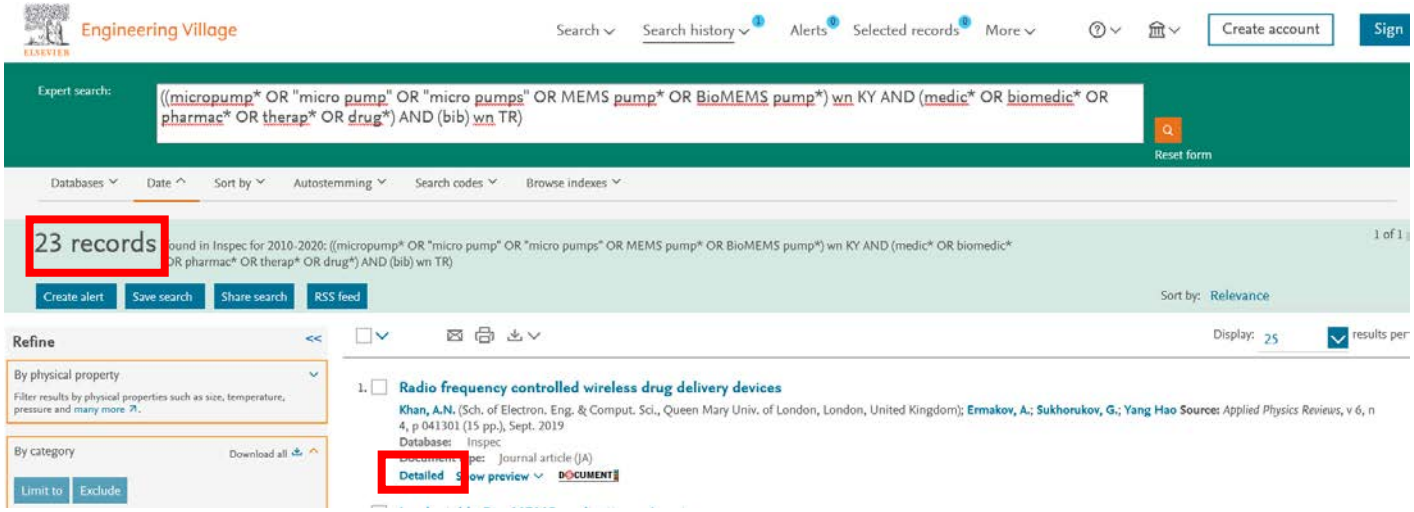
Combine the concepts using AND. Add wn KY after each concept to search in the Subject/Title/Abstract fields.



End the search by adding: **AND (bib) wn TR**. This offers documents that include more than 50 bibliographic references.



The search gave 23 results. Click on “Detailed” to evaluate the relevance of each result.



This literature review, containing 130 references, seems interesting.

Radio frequency controlled wireless **drug** delivery devices

Accession number: 19090235

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Abstract: **Drug** delivery devices have revolutionized the course of **therapeutic** treatment in the recent past. These devices provide a firm foundation for diverse strategies to overcome the limitations of systemic administration that cannot provide a high **drug** potency at the specific disease infected body tissues. The ongoing developments in the **pharmaceutical** industry have focused on exploring the reliable actuating mechanisms that can provide **therapy** and dispense **drugs** precisely to control **therapeutic** effects with minimum toxicity. The wireless actuation of **drug** delivery devices has been considered as an intervening noninvasive approach to release encapsulated **drug** compounds. This review paper highlights implantable and transdermal **drug** delivery devices that are based on wirelessly controlled microchips, **micropumps**, microvalves, and magnetic robots. Their key features, such as working principle, dimensions, materials, operating frequency, and wireless actuation through radio frequency for **drug** delivery are explained. The interaction of radio waves with electrically conductive and magnetic nanoparticles is also discussed for **drug** delivery. Furthermore, the radio frequency assisted data telemetry and wireless power transfer techniques are elucidated for **drug** delivery devices. The opportunities to enhance the patients' control on **therapeutic** indexes and release mechanisms are still possible by incorporating advanced wireless sensors for concocting future innovations in the wirelessly controlled **drug** delivery devices.

Number of references: 130

Inspec controlled terms: **biomedical** materials