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## DESCRIPTION

*Pharmacological Research* publishes cutting-edge articles in biomedical sciences to cover a broad range of topics that move the pharmacological field forward. We provide a venue through which specialists across disciplines can rapidly exchange information in health sciences that pertains to modern pharmacological topics. The journal publishes articles on molecular, biochemical, translational, and clinical research (including clinical trials); it is proud of its rapid publication of accepted papers that comprises a dedicated, fast acceptance and publication track for high profile articles.

Invited and unsolicited review articles are welcome.

### Journal Sections

Specific sections are dedicated to:

**The cardiovascular system:** CV disease therapy; Signal transduction and receptor pharmacology in the CV system; Target organs; Clinical trials.

**Neuroscience, including psychopharmacology, and neuroendocrinology:** Understanding of the central nervous system in physiological and pathological conditions; Neuropharmacological and molecular mechanisms of learning and memory; Therapeutic and diagnostic challenges for mental illness and neurodegenerative diseases; System biology.

**Oncology:** Targeted cancer therapy; Precision medicine and personalized therapy; Signal transduction studies, as related to drug action; Clinical trials.

**Immunology (clinical and basic):** Immune and inflammatory mechanisms including target identification; Immunotherapy and immunotoxicology; Immunopathology; Vaccines and adjuvants; Treatment of infectious diseases.

**Pharmacogenomics, Pharmacogenetics and Precision Medicine:** We are especially interested in GWAS studies and studies reporting pharmacogenetic data that are relevant in terms of safety and efficacy of drugs. They must provide insight into novel genomic or therapeutic associations that can help guide therapy selection or suggest new indications for established drugs. Studies can also provide details of exceptional responses in limited numbers of patients. We also publish n=1 studies of exceptional responses, provided they are backed up by compelling genomic or

experimental data. Studies must include full clinical description of the case, along with details of the response and supporting molecular information. The molecular information should support the clinical observations and offer a definitive pharmacogenomic insight. Standard clinical sequencing assays (Foundation ONE, Genoptix etc) are only appropriate when the therapeutic or phenotypic response is novel. Ideally, the observational patient studies should be supported by lab based functional data. **Bioactive molecules derived from medicinal plants or natural products:** New, effective bioactive molecules; Drug target identification; Treatment mechanism; Mechanism investigation with -omics and computational technologies; Combinational therapy with natural products; Multi-targeting and network pharmacology; Herbal bioinformatics; Precision medicine of natural products; Evidenced-based research and clinical trials.

Studies reporting on plant extracts in which the active principle(s) has not been defined do not fall into the scope of this journal. Exceptions can be made for papers addressing the mechanisms of actions or the clinical applications of standardized herbal preparations. Clinical studies on commercially-available nutraceuticals are also taken into consideration.

### **Rare diseases and orphan drugs, and drug repositioning**

We also publish articles focusing on: **Gastrointestinal, respiratory and urogenital apparatuses when involving pharmacological issues; Pharmacology of tissue repair/regeneration; Pharmacology of aging; Nutraceuticals (if relevant to human disease); Pharmacoeconomy; Pharmacoepidemiology.**

We do not publish: Papers reporting pharmacological activities of novel compounds if no proper controls with known substances are performed; Bioequivalence studies or studies reporting only the pharmacokinetics profile of a compound; Descriptive pharmacovigilance studies; Single dose/concentration studies and those measuring only one endpoint.

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**To find out more, please visit the Preparation section below.**

### **Topics we cover**

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### **Pregnancy Related Pharmacology and Perinatal Therapeutics:**

Drug effects on the mother and foetus before and after birth; Placental barrier and its relationship with drugs (transportation metabolism and so on); Molecular signalling in placenta and identification of mechanisms beyond drug action in pregnancy; Adverse effects of drugs drug/combination in placenta; Drug repurposing/reprogramming for placenta-related disorders; Regulatory aspects beyond clinical research in pregnant mothers; Placenta remodelling in disease; In vivo models of the diseased placenta; The microbioma; Effects of the environment on pregnancy; Preventive vs therapeutic use of drugs.

### **Dermatology and Skin Immunology:**

Mechanisms of skin physiology and pathology; Cutaneous immunology and immunopharmacology; Biomarkers discovery in skin diseases.

### **Pharmacology of the respiratory system:**

Therapeutic target identification; Biomarkers for disease phenotyping and endotyping; Small molecules, biologics, cell therapy and gene therapy; Pharmacogenomics and pharmacogenetics of Respiratory diseases; Pre-clinical and clinical development of novel therapeutic strategies.

### **Redox regulators and biological gases in pathophysiology:**

Oxidative and nitrative stress and cell dysfunction; Redox regulation of signal transduction in various diseases; Pathophysiological roles of NO, CO and H<sub>2</sub>S; Interaction between oxidants and gaseous mediators in health and disease; Pharmacological modulators of oxidants, free radicals and gaseous transmitters.

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#### **Types of paper**

1. *Original articles.* Original full-length research papers that have not been published previously, except in a preliminary form, may be submitted as regular papers.
2. *Review articles and meta-analyses.* Review articles and meta-analyses are welcome but should be topical and not just an overview of the literature.
3. *Opinion articles and Perspectives.* These articles provide expert views on future research and clinical trends in specific fields. These articles are solicited by the Editors, but suggestions are welcome.
4. *Letters to the Editor* on relevant issues of pharmacology or commenting on the published literature are also welcome.

Note: Pharmacological Research does not accept case reports for publication, nor short communications.

The type of paper has to be specified in the heading of the manuscript.

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The checklist will have to be uploaded at the time of the initial submission of each original article, effective from the 1st of June 2016. It will not be requested for perspectives or reviews.

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Authors are highly encouraged to include a list of 5-6 potential reviewers for their manuscript, with complete contact information. Please suggest referees who have presumably an interest in your article and are likely to have time to read it. Please suggest reviewers who can have an interest in your article and are likely to have time to read it.

### **Additional information**

Please make sure that your submission is in strict compliance with the guidelines provided in this document. The Publisher and Editors regret that they are not able to consider submissions that do not follow these guidelines.

Please note also that the following immediate rejection criteria apply:

1. Ethnopharmacological papers, namely studies that deal with locally-consumed plants.
2. In vitro antioxidant activity of plant extracts and pure compounds isolated from them.
3. Papers that describe pharmacological activities of plants which are not easily found worldwide, eg, Chinese herbs.
4. Papers reporting pharmacological activities of novel compounds if no proper controls with known substances are performed.
5. Papers describing the pharmacological activities of natural compounds are considered only if they identify novel mechanisms of action.

Note that ethnopharmacological studies generally do not fall into the scope of this journal. Exceptions are made for papers addressing the mechanisms of actions or the clinical applications of worldwide-used natural substances. Clinical studies on commercially-available nutraceuticals are also taken into consideration.

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[3] W. Strunk Jr., E.B. White, *The Elements of Style*, fourth ed., Longman, New York, 2000.

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[4] G.R. Mettam, L.B. Adams, How to prepare an electronic version of your article, in: B.S. Jones, R.Z. Smith (Eds.), *Introduction to the Electronic Age*, E-Publishing Inc., New York, 2009, pp. 281–304.

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