APPLICATION FOR AWARD

1. **Candidate**

   Surname: **van Staden**

   Surname before marriage: **Stefan**

   Name: **Raluca-Ioana**

   PhD awarded in 1997, with habilitation obtained in 2013.

   Position: **Senior Researcher, and Head of Laboratory of Electrochemistry and PATLAB**

   Institution: **National Institute of Research and Development for Electrochemistry and Condensed Matter**

   Position: **Professor – Scientific adviser for PhD students**

   Institution: **National University for Science and Technology Politehnica of Bucharest**

   Mobile:

   Email:

2. **Edition "Gala Cercetării Româneşti"**
3. **The award: e) Chemistry – "Raluca Râpan" Award; and category a) individual**
4. **Leader of the team: Yes. The candidate built the team of the Laboratory of Electrochemistry and PATLAB.**
5. **The composition of the team:** Not applicable
6. Description of the most important scientific achievements from the past 5 years
7. Curriculum vitae of the candidate
8. List of publications
9. Research projects for which the candidate was director of project
10. Patent awarded to the candidate

Required documents for Annex 2/ Selection sheet

1. Papers published in Q1 zone
2. Citation in Web of Science/Clarivate
3. Research projects for which the candidate was director of project
4. Invitations as invited professor/researcher to prestigious institutions
5. Editorial activities

6. **Cumulative influence score**

Although, myself – like none of the Romanian scientists is between the highest cited researchers in their field (unfortunately), my citations accordingly with Web of Science is as following:

Web of Science ResearcherID:
W-9855-2019

H-Index: 44

Publications in
Web of Science 402

Sum of Times Cited 22,684

Citing Articles 19,704

Sum of Times Cited by Patents 417

Citing Patents 407

Curriculum vitae

Raluca-Ioana van Staden (b. Stefan) was born on 16th of July 1969 in Campulung-Muscel, Arges.

Education In 1992 she obtained the BSc degree – with the highest average (9.98 out of 10) being the lieder of the students graduating Faculty of Chemistry, University of Bucharest in 1992; she obtained the PhD degree from the same faculty in 1997. Raluca also had a BSc degree from the National University of Music, Bucharest (1996), being specialised in piano and musical education, with a MSc degree in musical composition obtained in 1998.

Employments She was employed to date by Faculty of Chemistry, University of Bucharest (1992-1998) as Assistant Professor, Department of Chemistry, University of Pretoria as postdoc (1998-2000), and as Associate Professor of Analytical Chemistry and Bioanalysis (2001-2006). Since 2007, Raluca is employed as Senior Researcher I and Head of Laboratory of Electrochemistry and PATLAB, National Institute of Research and Development for Electrochemistry and Condensed Matter, and from 2013 by National University of Science and Technology Politehnica of Bucharest as Professor - Scientific adviser for PhD students.

Results of the research

Publications Raluca published 394 papers in peer-reviewed journals, 3 books and 15 chapters in books.

A total number of 112 papers were published in journals found in Q1 zone; from these, 25 papers were published in the past 5 years in journals found in Q1 zone.

A value of the indicator: $\sum_{1}^{394} \frac{AIS}{n_i} = 131.152965$ **was obtained for the papers published since the begining of the research career.**

For the past 5 years, the value calculated for this indicator was: $\sum_{261}^{394} \frac{AIS}{n_i} = 37.9101$.

134 papers and 4 chapters in books were published in the past 5 years.

The most relevant papers published in the past 5 years are:

In the field of biomedical analysis:

- **The papers related to early diagnosis of diabetes: nr. 269, 271, 287, 345**

- **The papers related to early diagnosis of cancer based on utilisation of stochastic sensors as screening tools: nr.** 279, 285, 290, 296, 299, 307, 310, 328, 349, 353, 369, 377, 379

In the field of pharmaceutical analysis: nr. 351, 364, 370

In the field of food analysis: nr. 266, 275, 277, 342, 361, 383

Raluca was author and corresponding author in 380 papers out of 394 papers published. **Only 5 papers are published as co-author in the past 5 years. A pioneers on stochastic sensors, enantioselective sensors and diamond paste sensors she brought in the past 5 years the sensors' technology to a very high level; cost-effective sensors and screening methods were developed for biomedical, pharmaceutical and food analysis. Screening methods for early detection of diabetes and cancer proposed by Raluca may be used for mass screening of population tto improve the state of health of population. Results obtained using the stochastic sensors were classified and used for developing algorithms for fast non-invasive diagnosis of cancer, and differentiation between gastric and colon types of cancers. Uniformity content tests of ointments/topical pharmaceutical formulations can be done *on-site* using stochastic platforms. Food safety can be checked using portbale instrumentation based on stochastic sensors. Enantioanalysis with stochastic sensors takes the metabolomics of cancer to a higher level, when mechanisms of DNA damage can be better ecplained based on results obtained using these sensors. These tests are unique in the world, Raluca receiving many invitations for plenary and invited lectures to chemistry and even medicine (cancer conferences) conferences, and to publish perspectives and feature papers in journals.**

Raluca is the main author of the three books published by prestigious international press: CRC Press, Marcel Dekker Inc and Taylor and Francis, and of the 15 chapters in books, published by Wiley, Elsevier, Marcel Dekker, Springer, Royal Society of Chemistry. **Five chapters in books were published as corresponding author by Raluca in the past 5 years, by invitation from the editors of the books.**

The patents awarded are applied at this stage for pre-clinical studies of screening tests using stochastic and multimode sensors integrated in platforms. First results of the studies are shown in the papers related to differentiation of different types of colon and gastric cancers by non-invasive analysis of urine and saliva [365, 372, 385, 388]; algorithms unique in the world at this stage.

The impact of the research activity

Accordingly with Web of Science (ResearcherID: W-9855-2019), Raluca's H-Index is 44. Her work was cited by over 22,684 (citing articles 19,704), cited by patents 417 (citing patents 407). Majority of citing papers are published in Q1 zone.

The patents awarded are applied at this stage for pre-clinical studies of screening tests using stochastic and multimode sensors integrated in platforms. The screening tests developed are cost-effective, and will be able to be applied for the mass screening of population, improving the quality of life, and reducing the costs with treatment of cancer in late stages.

Also, implementation of screening tests for food security will make possible determination of toxins and pesticides before the food is send to the market. The impact of the papers published on stochastic sensors for food safety was proved by the invitation received to be part of a COST type of project, with participants from European countries and from South Africa, a program related to food safety and security in EU.

Funding of research

My first funds for research were obtained from the Element6 company in South Africa, a company specialised in natural and synthetic diamonds, in 2001. For obtaining the funds I have to prepare a project related with utilisation of diamond as sensor material; the project had to be done by a MSc student at University of Pretoria, under my supervision. Three projects were selected for presentation in front of the board of the company. My project win, I obtained the MSc students with the related funds needed for research activities; the company produce the first porous synthetic diamond (today in the market as porous diamond) for sensors' design. The value of the project was 30,000Euro.

Raluca's research was very good funded through competitions organized by national and international funding agencies. Projects funded are found in the list Research Projects for which she was Director of project (11 projects), or responsabil from the partner (2 projects). A total of 4,829,298euro was obtained by Raluca through competitions organised by national and international funding agencies. From this amount, in the past 5 years the value of the funds obtained for the 3 research projects was 3,283,578Euro.

Three partnerships type of projects, from which one in the past five year were funded with Raluca as Director of project; the partners were universities from Bucharest, Timisoara, Targu-Mures, research institutes of Romanian Academy from Timisoara, and INCD from Cluj-Napoca, and one SME (a private clinic) from Bucharest. Four international projects were funded following competition: the DENAMIC, FP7 project brought a large number of partners

together from universities, research institutes, and hospitals from Europe; the three bilateral projects were done in cooperation with University of Cyprus and with University from Chisinau.

Participation in national and international conferences

Raluca was invited with 38 plenary/keynote/invited lectures to national and international conferences, from which ten invitations were for the past five years. She also presented more than 200 oral presentations and poster to the international conferences.

Invitations as guest professor/researcher

Prof Dr habil Raluca-Ioana van Staden received regularly invitations as invited professor and researcher from universities, e.g., University Tor Vergata, Rome Italy; University Yamagata, Yamagata, Japan; University Antwerpen, Antwerpen, Belgium; **University of Vienna**, Vienna, Austria; **University of the Witwatersrand**, Johannesburg, South Africa, **University of Istanbul**, Istanbul, Turkiye; **University of California Berkeley**, USA; **Friedrich-Schiller-University of Jena, Leibniz Institute of Photonic Technology**, University of Ankara, Turkiye.

Attached to this document, for the past 5 years period of time, please, find attached the invitation of Professor Mehmet Mahramanlioglu from **University of Istanbul** to present a short course and organize a session during the EUROANALYSIS 2019, a conference organized at University of Istanbul.

Unfortunately, due to travel restrictions during pandemics, extended until 2021, and even in 2022, I could not travel as invited professor or researcher, although there were invitations.

Recently, I received invitations from University of Ankara, Turkiye, and **Friedrich-Schiller-University of Jena, Leibniz Institute of Photonic Technology** to be guest professor and researcher (see the invitations attached) and to partner for EC research projects.

Collaboration with National Research Centre from Cairo is on-going for developing new methods of analysis for pharmaceutical compounds, and biomedical analysis.

A collaboration with Department of Chemistry, Jamia Millia Islamia, New Delhi, India on the invitation of Professor Imran Ali (Ph.D., C Chem, FRSC, Highly Cited Researcher Clarivate; Rank: 01 Indian & 24 Global (Anal. Chem.) as per 2% Scientists list Stanford Univ. USA.) started in 2023.

Professional service performed

Expert referee and panel member (from 2001) for National Council of Scientific Research in Higher Education and the National Authority for Research, Ministry of Research, Innovation and Digitization, and UEFISCDI Romania, National Research Foundation South Africa, Bulgarian National Research Found, Czech Republic, Poland and Portugal – research projects. **Invited lectures** at: de Beers Research Center, Johannesburg, February 2001. SACI, **Raikes Medal Lecture**, February 2003, **Invited lectures** given to different universities, e.g., University of Vienna, Wits University, University of Bucharest, University of Antwerpen, University Babes Bolyai, Cluj, University California at Berkeley; and for professional societies: American Chemical Society – San Francisco Section; Electrochemical Society – San Francisco Section. Invited lectures at TEDx Bucharest, 15 October 2010 and at TEDx Eroilor, Cluj-Napoca, December, 2011.

Invited short courses by ECS at San Francisco (2011, 2 short courses on sensors for clinical and pharmaceutical analysis), and ECS Meeting Seattle (2012, short course on enantioselective clinical analysis), by American Chemical Society at San Francisco (2011, 2 short courses on sensors for clinical and pharmaceutical analysis), by Division of Analytical Chemistry of EUCHEMs, at EUROANALYSIS (2011, one short course on quality and reliability in analytical chemistry) Belgrade, Serbia, and by ECS Sensor Division (2016, nanosensors for clinical analysis); **in the past five years invited short course by University of Istanbul – during the EUROANALYSIS conference in Istanbul, August 2019, Invited short course on bioanalysis by University of Geneva during the EUROANALYSIS Conference in Geneva, August 2023.**

Judge in the national photographic competition: SA Science Lens, South Africa; in the national competition: Gala of the Prizes for Education, Foundation ""Dinu Patriciu", 2011, Section Research, Romania; PRO INVENT (International Invention Salon), Romania, March 2013; **for poster competition for Sensors Division at ECS meetings in USA (permanent member of poster adjudication)**, and for the presentations at SmaSys 2015 conference, Japan.

Invited for **live interviews** by SABC Africa, programme 180 degrees and by Radio fm 95.9mHz - Johannesburg, 26 July 2004, South Africa; Invited for interview by Radio Romania Actualitati, Radio Romania Cultural, RadioNet3 Radio Romania International, TVR, B1, PROTV, PROTV international, Realitatea TV, Antena, TVRM, Trinitas, Money Channel, RomaniaTV.

Member of awards committee for Raikes Medal, SACI, South Africa (2022), and for 2024 Sensor Division Awards subcommittee from the Electrochemical Society, USA.

Editorial activities:

Guest editor for:

1. Analytical Letters – Special issue dedicated to the memory of Professor George Emil Baiulescu, Analytical Letters 43 (7-8), 2010
2. Sensors/MDPI – Special issue: Electrochemical Sensors for Food, Pharmaceutical and Biomedical Analysis, 2020-2023
3. Journal of Oncology – Special issue: From Molecular Genetics to Diagnosis and Therapy of Gastric Cancer, 2020-2021
4. Life, MDPI – Special issue on Serum and Tissue Biomarkers in Cancer: A Translational Approach, 2021-2023
5. Journal of the Electrochemical Society, Special issue on Women in Electrochemistry, 2021
6. Chemistry, MDPI for a special issue: Chemistry in Romania

Topic Editor:

1. Frontiers in Oncology – Advanced Molecular Targets in the Diagnosis and Treatment of Gastrointestinal Cancers
2. Frontiers in Sensors – Electrochemical (Bio)sensors for early diagnosis of cancer
3. Frontiers in Genetics - Prognosis and Diagnosis of Hepatocellular Carcinoma

Review Editor Frontiers in Bioengineering and Biotechnology - for Biosensors and Biomolecular Electronics.

Academic editor: Journal of Oncology: 2022-2023

Member of Editorial boards:

Analytical Letters, Taylor and Francis; Sensors, MDPI; Egyptian Pharmaceutical Journal, Wolter Kluwer Health/MedKnow; ECS Sensors Plus (journal of the Electrochemical Society).

Books published/chapters in books: Raluca published 3 books and 15 chapters in books, from which 5 chapters in books were published in the past five years. All are published in prestigious international press like, CRC Press, Marcel Dekker Inc, Taylor and Francis, Wiley, Elsevier, Springer, Royal Society of Chemistry.

National and international awards A high number of national and international awards were obtained by the candidate, as following:

1997 - ***Wilhelm Simon award*** - a six month Scholarship, by the ICSC – World Laboratory Lausanne, Switzerland

1999 - ***IUPAC award*** for ***Young Scientist***

2001 - ***Exceptional Young Researcher, University of Pretoria***

2002 - ***President Award, National Research Foundation, South Africa***

2002 - ***Raikes Medal****, South African Chemical Institute*

2003 - **together with Dr KI Ozoemena, as postdoc** *Claude Harris Leon Foundation award*

2004 – Special mention in the Women in Science L'Oreal UNESCO competition – South Africa

2009 – **Second Prize** on the competition **Gala of Prizes in Education, Section: Research**, organized by Foundation "Dinu Patriciu", **Bucharest, Romania, 2009**.

2010 – **Diploma of Excellence for the activity of invention** from ANCS (National Authority of Scientific Research), Romania, 8 June 2010, Bucharest, Romania.

2010 – **Diploma of Excellence for the representation with success of Romania to Salon International des Inventions de Geneve 2010**, from ANCS (National Authority of Scientific Research), Romania, 8 June 2010, Bucharest, Romania.

2010 – **Romanian Oscar for Excellence**, 11 October 2010, Bucharest, Romania.

2010 – **VIP Prize for Science and Life**, 1 September 2010, Bucharest, Romania.

2010 – **Honorary Citizen of Campulung-Muscel**

2010 – **Honorary Citizen of Arges county**

2010 – **Prize of National TV, Nationala Internationala for the invention activity**

2010 – **Prize: 10 for Romania for Research**

2010 – **The prize of Argesul Newspaper "Omul Anului"**

2010 – **Gala Successful Women, Prize for Excellence in Research and Medical fields**

2010 – **Women of the Year, Section Science, awarded by Advantage Magazine**

2011 – **Prize "Omul Anului"**, from organization Pro Democratia, Demos TN, Targu Neamt, December, 2011.

2012 – **Gogu Constantinescu Order and Medal, Degree Comandor**, Cluj-Napoca

2012 – Best Poster Award for a poster on stochastic sensor used for the screening of hepatitis B, 1st International Conference on Analytical Chemistry, Targoviste, September 2012

2012 – **Henri Coanda Gold Medal**, National Conference on Research and Innovation, Bucharest, Romania

2013 – **Prize "She Business" for excellence in research** for developing a screening method for early detection of breast cancer

2017- Prize Radar de Media for the Research Activities

In the past 5 years:

2019- Gheorghe Spacu Medal and Award from the Romanian Society of Chemistry, for the high national and international recognition of her research by the peers.

2020-ACS FELLOW awarded by the American Chemical Society (the first Romanian to obtain this award, and title from this prestigious society), for pioneering work in stochastic sensors for biomedical analysis

2023-Prize for the stochastic sensors used for early diagnosis of cancer, awarded for the best women researcher out of 10 selected by magazine Capital, Romania

2023-BIZINVENT award for research work performed for early diagnosis of cancer using stochastic sensors; the prize was awarded by Association for Education Teofor, within the event "Gandit in Romania", 2nd Edition under the name George Emil Palade

Awards obtained at international inventions salons for the patents:

2008 – **Gold Medal** and **Diploma of Excellence** for a patent on stochastic sensors at the **2nd International Congress of the Researchers and Inventors from Romania**, 11-12 December 2008, Bucharest, Romania.

2009 – **Pro Invent Medal and Diploma of Excellence,** and **Diploma of Excellence of the Society of Inventors from Romania,** for a patent on stochastic sensors at the Pro Invent, 24-27 March 2009, Cluj-Napoca, Romania.

2009 – **Gold Medal,** and **Arca Prize of the Society of Inventors from Croatia,** for a patent on stochastic sensors at the **37eme Salon International des Inventions des Techniques et Produit Nouveaux, 1-5 April 2009, Geneve, Switzerland.**

2009 – **Gold Medal,** and **the Prize of the Polish federation of Engineering Association - NOT,** for a patent on stochastic sensors at the **International Warsaw Invention Show, IWIS 2009, 1-3 June 2009, Warsaw, Poland.**

2009 – **Gold Medal**, and **Prize of Technopol Moscow**, for a patent on a stochastic microsensor for early detection of cancer, at **IX Moscow International Salon of Innovations and Investments,** 26-29 August 2009, **Moscow, Russian Federation.**

2009 – **Silver Plate**, for a patent on a stochastic microsensor for early detection of cancer, at **ARCA,** 15-19 September 2009**, Zagreb, Croatia.**

2009 - **Gold Medal**, and the Prize **EXCELLENCE RECOGNITION AWARD of the Society of Inventors from Croatia**, for a patent on a stochastic microsensor for early detection of cancer, at INVENTIKA, 28-31 October 2009, **Bucharest, Romania.**

2009 - **Gold Medal with merit**, and the **Prize of AGEPI**, for a patent on a stochastic microsensor for early detection of cancer, at EUREKA 2009, 19-21 November 2009, **Brussels, Belgium.**

2010 - **Gold Medal with special mention and Diploma of excellence**, for a patent on a stochastic microsensor for early detection of cancer, at PRO INVENT 2010, 16-19 March 2010, **Cluj-Napoca, Romania.**

2010 - **Gold Medal with the congratulations of the jury, WIPO award for the best woman inventor, and AGEPI medal**, for a patent on a stochastic microsensor for early detection of cancer, at **38^{e} Salon International des Inventions de Geneve, 21-25 April 2010, Geneve, Switzerland.**

2010 – **2nd Prize, Category "Inventions"**, for a patent on a stochastic microsensor for early detection of cancer, at **Bright fair 2010, World Forum of Researchers and Inventors, 8-10 October 2010, Bucharest, Romania.**

2010 – **Prize of the Society of Inventors from Romania, and the Medal of the Society of Inventors** for a patent on a stochastic microsensor for early detection of cancer, at **The First Fair of Inventions,23-Novemberr 2010, Jassy, Romania.**

2011 – **Prize of the Technical University of Cluj-Napoca, and Order Leonardo da Vinci** for a patent on enantioselective sensors, at PRO INVENT 2011, March 2011, **Cluj-Napoca, Romania.**

2011 – **Gold medal** and **Prize of the International Society of Inventors,** for a patent on enantioselective sensors, at **39^{e} Salon International des Inventions de Geneve, April 2011, Geneve, Switzerland.**

2012 – **Gold medal of the Ukraine Society of Inventors** for a patent on enantioselective sensors, at National Conference on Research and Innovation, May 2012, **Bucharest, Romania.**

2012 – **Gold medal** for a patent on enantioselective sensors, at IFIA, November 2012, **Kuwait.**

2012 – **Gold medal** for a patent on early detection of cancer, at IFIA, November 2012, **Kuwait.**

Membership in national and international bodies

- **Sigma Xi, The Scientific Research Honor Society, Full member**

- **Electrochemical Society/USA – full member, Sensor Division - member of the Executive Committee and Member-at-Large; member of awards sensor division subcommittee**
- Member of the American-Romanian Academy for Science and Arts
- **DAC of EUCHEMs – full member, Representative of Romanian Society of Chemistry; Head of Study group on Bioanalysis.**
- The South African Chemical Institute – full member
- American Chemical Society – from 2020 FELLOW, and from 2013 Chair of the Romanian International Chapter of ACS
- International Society of Electrochemistry – full member
- International Society of Bioelectrochemistry – full member
- Romanian Society of Chemistry – full member
- The Israeli Metrological Society – full member
- **IUPAC – FELLOW** from 2002.
- **Secretary, Commission V.1, General Aspects on Analytical Chemistry, IUPAC 1999-2001.**

Role in Scientific Commitees:

- Scientific Organizing Committee of The XIIIth National Conference on Analytical Chemistry, Craiova, Romania, 1996.
- Scientific Organizing Committee of Chemometrics Workshop, Timisoara, Romania, 1997.
- Scientific Organizing Committee of The XIVth National Conference on Analytical Chemistry, Piatra Neamt, Romania, 1998.
- **Co-secretary, 7th International Conference on Kinetics in Analytical Chemistry, Bucharest, Romania, 2001.**
- **Co-secretary, ICFIA'2003, Merida, Venezuela, 2003.**
- **Member of the Technical Program Committee of the 10th International Meeting on Chemical Sensors, July 11-14, 2004. Tsukuba, Japan.**
- **Chair and member of the Scientific Committee – SENSOR DEVICES 2010, Venetia, Italy, July 2010; SENSOR DEVICE 2011, Nice, France, August 2011; SENSOR DEVICES 2012, Roma, Italy, August 2012; SENSOR DEVICES 2013, Barcelona, Spain; SENSOR DEVICES 2014; SENSOR DEVICES 2015.**
- **Chairman, 1st International Conference on Analytical Chemistry, RO-ICAC'2012, 18-21 September, 2012, Targoviste, Romania.**
- **Chairman, 2nd International Conference on Analytical Chemistry, RO-ICAC'2014, 17-21 September, 2014, Targoviste, Romania.**
- **Chairman, 3rd International Conference on Analytical Chemistry, RO-ICAC'2016, June, 2016, Timisoara, Romania.**

- **Chairman, RO'ICAC 2016, 3rd International Conference on Analytical Chemistry, Iasi, Romania, 2016**
- **Chairman, RO'ICAC 2018, 4th International Conference on Analytical Chemistry, Bucharest, Romania, 2018**

In the past five years:

- **Chairman, RO'ICAC 2024, 5th International Conference on Analytical Chemistry, Bucharest, Romania, 2024**
- **Symposium organizer for Sensor Division of the Electrochemical Society, USA, two times a year for the international conferences organized by the society**
- **DAC workshop organizer during Euroanalysis conference, Geneva, Switzerland, August 2023.**

Building the team of Laboratory of Electrochemistry and PATLAB

On the occasion of my employment as Head of Laboratory of Electrochemistry and PATLAB, I was asked to build a strong team of young researchers. At the stage of employment the laboratory comprised two senior researchers (myself and JF van Staden), and two researchers closed to the pension age. JF van Staden and myself applied for projects to re-design the old laboratories, and get the modern instrumentation/equipment, and projects that can sustain salaries (the only source of salaries in our institute is the money coming from research projects) and materials for researchers. We get both types of projects in September 2007, and by the end of the year our laboratories were re-designed, and the acquisition of instrumentation started. I start to employ PhD students from 2008, and by getting funds from projects funded through competitions I was able to employ more MSc, PhD, and postdoc students so that in 2013 the number of active members of the laboratory (almost all under 35 years old) rise to 20 members. Unfortunately, due to delays yearly in salaries at the beginning of each year (delays due to late opening of the financial year, and due to receiving late the money for the projects) we lost valuable members of our laboratory. At the moment, the number of people in my team is 12 to which are added the PhD students, MSc students and occasionally undergraduate students from University of Bucharest and National University of Science and Technology Politehnica of Bucharest. Our team is the best in our institute – through the rate of number of publications per member of the team, through the numbers of papers published in Q1 journals, invitations to conferences, participation to conference (the team was highly rated at the last Euroanalysis conference due to the oral and poster presentations), invitations in editorial boards, international awards obtained at high rated conferences like Euroanalysis, ARA Conference in Los Angeles, and awards for best young analytical chemist "Constantin Luca award" (this

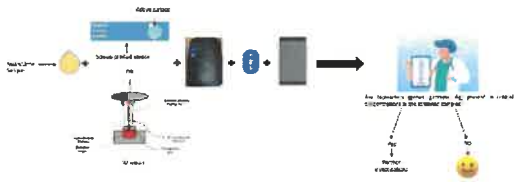
award is judge by an international panel of high rated analytical chemists in the world) of the Romanian International Chapter of ACS. The team was already getting the international recognition for the quality of research. A postdoc member of the team was one of the best 10 women researchers in 2022, accordingly with the magazine Capital. Many members of the team got research projects funded trough the national competitions. While almost all members of the team started as assistant researcher, due to their high level of research performed, one of them became last year senior researcher I, two members became last year senior researcher II, a number of them are senior researcher III, and senior researchers, with only two members (employed in the past 2 years) as assistant researchers.

To date I also supervise 6 BSc students, 9 MSc students, and 24 PhD students (14 were awarded the PhD with the highest qualification Summa cum laude; 10 PhD students are still busy with their PhD in different stages) and I was mentor for 6 postdocs. All members of my team, except JF van Staden were my PhD students or my postdocs or my MSc students.

Supporting the young researchers, investing in their knowledge is the most beautiful thing ever; and the beauty is to see them blooming, having excellent results, having invitations from high rated conferences and journals. I am very proud of my research team which is my second family.

Description of the most important scientific achievements from the past 5 years

"No analysis is better than the sample itself." (GE Baiulescu) – this is the motto of my research. Performing of analysis without any processing of sample or with the minimum processing steps will reduce the uncertainty of the results, making the analysis more reliable. Developing of stochastic sensors proved to fit perfectly into the motto, as their utilization as screening/analysis tools can be done without any processing of samples. The plus value of the stochastic sensing is given by: sensors' capacity of performing qualitative analysis (based on the signatures of analytes) and highly reliable quantitative analysis; the response of the stochastic sensors is not dependent on the complexity of the matrix (biological sample, food sample, pharmaceutical sample) used for the screening test. Raluca-Ioana van Staden (b. Stefan), recognized for her pioneering work on the fields of stochastic sensors (WIPO award for the Best Women Inventor), and enantioselective sensors, brought in the past five years the knowledge on sensors' technology to a higher level. New nanomaterials and nanocomposites were developed and used for new designs of 2D and 3D sensors. The 2D and 3D design was moved from laboratory type closed to the commercial type - this was possible by using the 3D printer from our laboratory. Integration of 2D and 3D sensors into analytical platforms coupled to smartphone facilitated *on-site* fast screening tests of biological samples, pharmaceutical samples as well as of food and beverages. An example of experimental set-up proposed for the 2D/3D stochastic sensors is shown in Scheme 1.



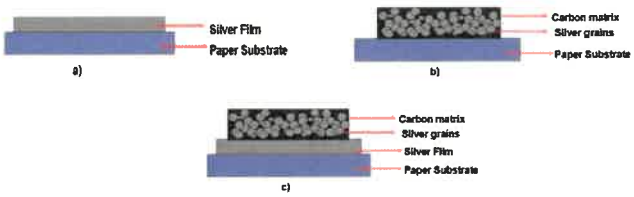
Scheme 1 Example of experimental set-up for 2D/3D sensors integrated in analytical platforms.

The sensors are coupled to the USB sized device, and the results are transmitted via wireless to the smartphones, thus being able to further send the results to the medical doctors' or customers' devices like phone, notebook, or computer. The cost per analysis is very low, and they can be used for multianalyte determinations in various samples.

The achievements in the sensors' design technologies can be divided in the following directions: **(1) stochastic sensors for biomedical analysis** (1a) development of new stochastic sensors as new tools for screening of biological samples for early diagnosis of diabetes – part of PN-III-P4-ID-PCE-2016-0120 project (which received the Excellent qualification from the evaluators), and **(1b) stochastic sensors as new tools for screening tests used for early diagnosis and differentiation of gastric and colon cancers** – results obtained within the PN-III-P4-ID-PCCF-2016-0006 project which

received the Excellent qualification from the evaluators; **(2) stochastic sensors for pharmaceutical analysis**, and **(3) stochastic sensors for safety/quality of food and beverages.**

(1)Stochastic sensors for biomedical analysis (1a) New materials and designs were selected for stochastic sensors proposed for analysis of selected biomarkers used in early diagnosis of diabetes. Nanolayer and nanolayer by nanolayer deposition of nanofilms of Ag and C using cold plasma in sequences: Ag, Ag-C, Ag-Ag-C (Scheme 2), on porous paper, was used to design three disposable stochastic sensors for the assay of islet amyloid polypeptide from whole blood [287].



Scheme 2 Configuration of the disposable stochastic sensors based on: a) silver nanofilm; b) Ag-C composite nanofilm; and c)Ag-C composite nanofilm deposited on a Ag nanofilm.

The nanofilms were modified with α-cyclodextrin. Wider linear concentration range ($1.00x10^{-6}$-1.00 ng mL^{-1}), and lower limit of quantification ($1.00x10^{-6}$ng mL^{-1}) were obtained using the disposable stochastic sensors based on Ag-C and Ag-Ag-C, while highest sensitivity ($3.19x10^{4}$ s^{-1}/μg mL^{-1}) was recorded using the disposable stochastic sensor based on Ag-Ag-C. The screening methods were fully validated using whole blood samples from confirmed patients, when the recovery of the islet amyloid polypeptide was higher than 98.00%. High selectivity vs peptide C, adiponectin, dopamine, and zinc ions was obtained. For the analysis of fractalkine [345], a key biomarker for early diagnosis of diabetes, a smartphone-based mobile device was proposed for the fast screening of serum samples in order to detect the prediabetes stage. The smart device is able to send the data to the smartphone of the patient and of the medical doctor using bluetooth. A screen-printed stochastic electrode (the surface of the stochastic screen-printed electrode is based on carbon modified with carboxyl functionalised multi-walled carbon nanotubes) was used as detection tool in the cellular-based mobile device. The sensitivity of the screen-printed stochastic electrode is very high ($3.58x10^{3}s^{-1}$ g^{-1} mL), and the limit of determination very low (2.05fg mL^{-1}). The screening method is able to perform a qualitative analysis as well as a high reliable quantitative analysis of fractalkine in serum samples with a recovery (%) vs ELISA (the standard method) of 99.96 and a relative standard deviation of 3.28%. The cost per analysis is very low. Three stochastic microsensors designed using matrices based on diamond, graphite and graphene decorated with Pt nanoparticles modified with 2,6-bis (E)-2-(thiophen-3-yl)-4-4-(4,6,8-trimethylazulen-1-1yl) pyridine and protoporphyrin IX (PIX) were designed, characterized and validated for the assay of diabetes' predictive biomarkers: C-reactive protein, adiponectin and Zn^{2+}[269]. Wider working concentration ranges were obtained with low

limits of determination-for C-reactive protein: $8.20x10^{-8}$mg mL^{-1}, for adiponectin $2.50x10^{-8}$µg mL^{-1}, and for Zn^{2+} $1.36x10^{-10}$ µg mL^{-1}. The sensitivities of all tested stochastic microsensors were very high. High accuracy and precision were recorded when used for their simultaneous assay in biological samples. Enantioanalysis of glucose [271] performed in whole blood and urine using enantioselective stochastic sensors will facilitate the clinical research needed to establish the role of the ratio between L- and D-glucose in diabetic and nondiabetic patients; two stochastic sensors based on the nanographene (nanoGR) paste and on the paste of exfoliated graphene (exfGR) modified with 2, 2-diphenyl-1-picrylhydrazyl (DPPh) were designed and used for the molecular enantiorecognition of D- and L-glucose in urine and whole blood samples. The recoveries values (higher than 99.00%), and the low relative standard deviation values (less than 0.10%) proved that the proposed stochastic sensors can be reliable used for the molecular enantiorecognition of D- and L-glucose in biological fluids such as whole blood and urine.

(1b) Needle stochastic sensors were developed and used for biomedical analysis [290, 299, 307]. Sulphur doped graphenes were synthesized, characterized and used for the design of three 3D-needle stochastic sensors [307]. p53 and carcinoembryonic antigen were used as model analytes for the screening tests of whole blood, urine, saliva, and tissues. Low limits of determination (of magnitude orders 0.1-100 pg mL^{-1}) and high sensitivities (of magnitude orders up to 10^7) were achieved. Recovery tests shown that the biomarkers can be recovered with recoveries higher than 96.00%, and relative standard deviations lower than 1.00% from the whole blood, urine, saliva, and tissues. Four biomarkers used in bladder cancer diagnosis: p53, E-cadherin, bladder tumor antigen (BTA) and hyaluronic acid were taken into consideration for the screening tests using stochastic needle sensors [290]. Three stochastic needle sensors, based on graphite powder, modified with three types of chitosan were designed and characterized for the screening test. The proposed sensors showed low limits of quantification, and high sensitivity and selectivity levels. The recoveries of p53, E-cadherin, BTA and hyaluronic acid in whole blood samples and tumoral tissue samples were higher than 95.00% with relative standard deviation lower than 1.00%. Human epidermal growth factor receptors' (HER) family together with heregulin-α place an important role in diagnosis of cancer. Therefore, stochastic sensors were developed for heregulin-α [310]. Four 3D stochastic microsensors based on single-walled carbon nanotubes decorated with gold nanoparticles and modified with inulins were designed and used for the simultaneous molecular recognition and quantification of heregulin-α and HER family (HER1–4) in tumor brain tissue and whole blood samples [362]. The proposed microsensors presented limits of determination of fg mL^{-1} magnitude order (heregulin-α 4.1fg mL^{-1}, HER1 andd HER2 3.9fg mL^{-1}, HER3 and HER4 1.0fg mL^{-1}) and wide linear concentration ranges, when used for screening of tissue samples and whole blood. DNA damage in cancer was assessed using stochastic sensors and microsensors with different designs [296, 369, 377], by determination of 8-nitroguanine

and 8-hydroxy-2`-deoxyguanosine [296] in whole blood and urine using three different oleamides, respectively N-(2-piperidin-1-ylethyl) oleamide, N-(3,4-dihydroxyphenethyl) oleamide and N-(2-morpholinoethyl) oleamide; and of mismatch repair proteins and KRAS using stochastic microsensors and platforms [369, 377]. Two miniplatforms based on stochastic microsensors designed using Nitrogen (9.3%) and Boron (2.4%) - dopped graphene (NB-DG) modified with frutafit HD and frutafit TEX were designed and validated for the assay of MLH1, MSH2, MSH6, PMS2, and of KRAS in whole blood, urine, saliva, and tumoral tissues [369]. Limits of determination of fg/mL magnitude order were recorded. The % recoveries of MLH1, MSH2, MSH6, PMS2, and of KRAS in whole blood, urine, saliva, and tumoral tissues were higher than 99.00 with RSD (%) values lower than 0.08%. The results obtained for DNA damage in cancer and for maspin analysis using 2D stochastic sensors [328], favorized differentiation of types of colon and gastric cancer by non-invasive analysis of urine and saliva [365, 372, 385, 388]. Enantioanalysis of amino acids such as glutamine [285], tryptophan [279] and arginine [339] proved to be a key factor in establishing the metabolomics in gastric cancer; stochastic sensors based on protoporphyrin IX, ß-cyclodextrin, and 2,2-diphenyl-1-picrylhydrazyl [285, 279], and also 3D needle enantioselective stochastic sensors based on N,S-decorated graphenes modified with 2,3,7,8,12,13,17,18-octaethyl-21H,23H-porphine manganese(III) chloride [339] proved that the D-enantiomer is found only in the confirmed patients with gastric cancer.

(2) Stochastic sensors for pharmaceutical analysis; A multimode sensor (a sensor responding simultaneously to more than one mode, e.g., stochastic mode, amperometric mode, voltametric mode) based on graphite paste modified with N-methylfulleropyrrolidine was proposed for the determination of butoconazole nitrate in its pharmaceutical formulation [351]. Both stochastic mode and square wave voltammetry mode were applied for qualitative and quantitative assay of butoconazole nitrate in the pharmaceutical topical ointments. A stochastic platform based on calix[6]arene and TiO_2-modified reduced graphene oxide electrode was proposed for on-site determination of nonivamide in topical pharmaceutical formulations [370].

(3) Stochastic sensors for safety/quality of food and beverages Quality of food it is very important for the state of health of population. A smart portable device based on disposable stochastic sensor design by impregnation of a nanolayer C-Ag coated paper with a porphyrin was used for simultaneous assay of bisphenols A,C,E,F,S, and Z in food samples, at pmol L^{-1} concentration level with recoveries higher than 99.00% [361]. Two diamond paste sensors were used for determination of aflatoxin M in milk from 0.001fg L^{-1} to 20µg L^{-1} and recoveries higher than 99.00% [266]. On-site screening platforms based on utilization of stochastic sensors were proposed for the assay of atrazine in lemon juice, apple juice and tomato juice at pmol L^{-1} level [383]. The proposed sensors are cost-effective, and are part of portable instrumentation being able to be used for *on-site* screening of food.

Prof Dr habil, CSI Raluca-Ioana van Staden (born Stefan)

Editorial activities:

Guest editor for:

1. Analytical Letters – Special issue dedicated to the memory of Professor George Emil Baiulescu, Analytical Letters 43 (7-8), 2010
2. Sensors/MDPI – Special issue: Electrochemical Sensors for Food, Pharmaceutical and Biomedical Analysis, 2020-2023
3. Journal of Oncology – Special issue: From Molecular Genetics to Diagnosis and Therapy of Gastric Cancer, 2020-2021
4. Life, MDPI – Special issue on Serum and Tissue Biomarkers in Cancer: A Translational Approach, 2021-2023
5. Journal of the Elecrochemical Society, Special issue on Women in Electrochemistry, 2021

Topic Editor:

1. Frontiers in Oncology – Advanced Molecular Targets in the Diagnosis and Treatment of Gastrointestinal Cancers
2. Frontiers in Sensors – Electrochemical (Bio)sensors for early diagnosis of cancer
3. Frontiers in Genetics - Prognosis and Diagnosis of Hepatocellular Carcinoma

Review Editor Frontiers in Bioengineering and Biotechnology - for Biosensors and Biomolecular Electronics.

Academic editor: Journal of Oncology: 2022-2023

Member of Editorial boards:

Analytical Letters, Taylor and Francis

Sensors, MDPI

Egyptian Pharmaceutical Journal, Wolter Kluwer Health/MedKnow

ECS Sensors Plus

Prof Dr habil Raluca-Ioana van Staden received regularly invitations as invited professor and researcher from universities, e.g., University Tor Vergata, Rome Italy; University Yamagata, Yamagata, Japan; University Antwerpen, Antwerpen, Belgium; **University of Vienna**, Vienna, Austria; **University of the Witwatersrand**, Johannesburg, South Africa, **University of Istanbul**, Istanbul, Turkiye; **University of California Berkeley**, USA; **Friedrich-Schiller- University of Jena, Leibniz Institute of Photonic Technology**, University of Ankara, Turkiye.

Attached to this document, for the past 5 years period of time, please, find attached the invitation of Professor Mehmet Mahramanlioglu from **University of Istanbul** to present a short course and organize a session during the EUROANALYSIS 2019, a conference organized at University of Istanbul.

Unfortunately, due to travel restrictions during pandemics, extended until 2021, and even in 2022, I could not travel as invited professor or researcher, although there were invitations.

Recently, I received invitations from University of Ankara, Turkiye, and **Friedrich-Schiller- University of Jena, Leibniz Institute of Photonic Technology** to be guest professor and researcher (see the invitations attached).

XX. euro ANALYSIS 2019

TURKISH CHEMICAL SOCIETY

EuCheMS European Chemical Sciences

September 1-5, 2019
Istanbul University, İstanbul / TURKEY

October 3th, 2018

Dear Dr. Raluca I.S. van Staden

On behalf of the organizing committee, it is my great pleasure to invite you to give **a short course** on the EuroAnalysis XX Conference to be held from September 1st to 5th, 2019 in our beautiful city of Istanbul, Turkey.

The meeting will be hosted by Turkish Chemical Society in collaboration with the Division of Analytical Chemistry of EuChemMS and the local organizers Ankara University and Istanbul University.

The scientific program will include plenary and keynote lectures given by – distinguished experts in the field, as well as oral and poster presentations and vendor seminars. Participation of young researchers, both from industry and academia, will be strongly supported by a dedicated young scientist session, best oral presentation and poster awards as well as a reduced registration fee and affordable lodging.

As can be seen from the conference webpage (http://euroanalysis2019.com/), the conference will be on various topics of analytical chemistry. The social program of the conference will be designed in the way to maximally facilitate scientific and cultural exchange between the conference participants representing various ages and cultural groups. All conference participants and registered accompanying persons are kindly invited to all conference related scientific and social events (sessions, receptions, lunches, and dinners).

We are pleased to offer you free conference registration, and participation in all social events of the symposium, as well as free accommodation. Unfortunately, we cannot cover the flight expenses.

The short course topic is up to you, that will be conducted before Euroanalysis XX, 31th August or 1st of September. The workshop can be half day or full day, up to your programme.

If you want, you can invite a colleague to organize with you. We are pleased to offer he/she free conference registration, and participation in all social events of the symposium, as well as free accommodation. Unfortunately, we cannot cover the flight expenses.

I hope that above mentioned conditions are acceptable for you and look forward to welcoming you in Istanbul, Turkey

On behalf of the Scientific and Organizing Committees,

Sibel A. Ozkan and Mehmet Mahramanlioglu
Chairs of the Symposium

Ankara University, Faculty of Pharmacy
Department of Analytical Chemsitry
Ankara,Turkey

Istanbul University, Faculty of Engineering
Department of Chemistry
Beyazıt/Fatih-İstanbul

ANKARA UNIVERSITY FACULTY OF PHARMACY
DEPARTMENT OF ANALYTICAL CHEMISTRY

Ankara

November 30th, 2023

INVITATION LETTER

Dear Dr. Prof Dr., Raluca-Ioana van Staden,

I would like to invite you to my lab as a Visiting Professor and Researcher to work in my research laboratory and share the knowledge at the Department of Analytical Chemistry, Faculty of Pharmacy, Ankara University, Turkiye.

This acceptance to visit Ankara University is contingent upon verification of academic credentials and your agreement to abide by the policies and regulations of the University. I look forward to your association with our department.

Sincerely,

Prof. Dr. Sibel A. OZKAN

ANKARA UNIVERSITY FACULTY OF PHARMACY DEPARTMENT OF ANALYTICAL CHEMISTRY, Ankara-TURKIYE

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Prof. Dr. habil. Raluca-Ioana van Staden
Head of Laboratory of Electrochemistry and PATLAB
Bucharest
National Institute of Research for Electrochemistry
and Condensed Matter
202, Splaiul Independentei Str.
060021, Bucharest-6, Romania

ANSPRECHPARTNER | UNSER ZEICHEN | IHR ZEICHEN | DATUM

12 December 23

Dear Prof. Staden,

I hope this message finds you well. It is with great pleasure that I invite you, as an esteemed professor and researcher, to join our university for collaborative initiatives in the field of biomedical analysis. Your recognized expertise in stochastic sensors for biomedical analysis makes you an ideal candidate for this endeavour.

During your visit, we aim to foster a meaningful partnership and explore opportunities for joint research activities and collaborations. In addition, we are pleased to inform you that we have already signed an agreement for upcoming European Union research projects and we believe that your involvement will contribute significantly to the success of these initiatives.

The purpose of your visit is not only to share knowledge, but also to strengthen our collaboration and discuss potential areas of mutual interest. We are confident that your unique insights and contributions will enhance our research capabilities and contribute to the advancement of the biomedical field.

I sincerely hope that you will accept this invitation to visit our University and embark on a journey of fruitful collaboration. Your presence and expertise will undoubtedly enrich our academic environment and contribute to the success of our joint endeavours.

Please do not hesitate to contact me to further discuss the details of your visit and collaboration. We eagerly await the opportunity to work closely with you and look forward to the positive impact our collaboration will have on the field of biomedical analysis.

Thank you for your consideration of this invitation and I look forward to a positive response.

Yours Sincerely,

Dr. Anuradha Ramoji
Research Associate

Invited Lectures

1. *Estimation of uncertainties in clinical analysis*
   R.I. Stefan, G.E. Baiulescu, H.Y. Aboul-Enein, J.F. van Staden
   The Twelfth International Conference of the Israel Society for Quality, Jerusalem, Israel, 1-3 December 1998. (Keynote lecture)

2. *The influence of matrix additives on ion-selective membrane electrodes response*
   R.I. Stefan, J.F. van Staden, H.Y. Aboul-Enein, G.E. Baiulescu
   Pittcon 2000, New Orleans, LA, USA, 12-17 March 2000. (Keynote lecture)

3. *Enantioselective sensors in pharmaceutical analysis*
   R.I. Stefan
   First International Conference on Analytical Chemistry - SCAR 2000, Brasov, Romania (Opening plenary lecture) 21-23 September 2000.

4. *Electrochemical sensors and kinetics in analytical chemistry*
   R.I. Stefan, J.F. van Staden
   KAC'2001, 7th International Symposium on Kinetics in Analytical Chemistry, Bucharest, Romania. 21-23 September 2001. (Keynote lecture)

5. N*ew horizons in sequential injection kinetic analysis*
   J.F. van Staden, R.I. Stefan
   KAC'2001. 7th International Symposium on Kinetics in Analytical Chemistry. Bucharest. Romania. 26 - 29 September 2001. (Plenary lecture)

6. *Chiral recognition using potentiometric, enantioselective membrane electrodes*
   R.I. Stefan
   IMCS'2002. 9th International Meeting on Chemical Sensors. Boston, USA. 7-10 July 2002 (Plenary lecture)

7. *Fullerenes and their derivatives as new chiral selectors for the design of electrochemical sensors.*
   R.I. Stefan
   Euroanalysis XII. Division of Analytical Chemistry of the Federation of European Chemical Societies and Gesellschaft Deutcher Chemiker. Dortmund. Germany. 8 - 13 September 2002. (Keynote lecture)

8. *Multicomponent analysis using electrochemical sensors in flow systems.*
   R.I. Stefan, J.F. van Staden
   ICFIA'2003. 12th International Conference on Flow Injection Analysis, including related techniques. Merida. Venezuela. 7 - 13 December 2003. (Plenary lecture)

9. Chemical speciation by sequential injection analysis (SIA) with spectrophotometric detection
   J.F. van Staden and R.I. Stefan
   ICFIA'2003. 12th International Conference on Flow Injection Analysis, including related techniques. Merida. Venezuela. 7 - 13 December 2003. (Plenary lecture)

10. Process analytical technology (PAT) as an environmental tool. Does it fulfill the expectations?
J.F. van Staden, **R.I. Stefan-van Staden**
3rd Black Basin Conference on Analytical Chemistry, 12th-14th of September 2005, Constantza, Romania

11. Stochastic Microsensors for Molecular Diagnosis
R.I. Stefan-van Staden
13 IMCS'2010. 13th International Meeting on Chemical Sensors. Perth, Australia. 11-14 July 2010 (Keynote lecture)

12. Early detection of cancer - a chance for life
R.I. Stefan-van Staden
Chronic Diseases. Bucharest, Romania. 22-23 September 2010 (Plenary lecture)

13. Multimode sensors for pharmaceutical analysis
R.I. Stefan-van Staden
1st World Drug Discovery online Conference, Huston, TX, USA, October 20-22, 2011 (Keynote lecture)

14. New electrochemical sensors for biomedical investigations
R.I. Stefan-van Staden
220th ECS Meeting & Electrochemical Energy Summit, Boston, MA, USA, October 9-14, 2011 (Keynote lecture)

15. Stochastic dot microsensors for the assay of dopamine in pharmaceutical samples and biological fluids
R.I. Stefan-van Staden
2nd World Drug Discovery online Conference, Huston, TX, USA, October 16-18, 2012 (Keynote lecture)

16. New trends in food analysis
R.I. Stefan-van Staden
Challenges in Food Analysis, International Workshop, Constantza, Romania, May 31 – June 1, 2013 (plenary lecture)

17. Stochastic microsensors based on nanostructured materials used in the screening of whole blood for Hepatitis B
R.I. Stefan-van Staden, Iuliana Moldoveanu
224th ECS Meeting & Electrochemical Energy Summit, San Francisco, CA, USA, October 26-November 1, 2013 (Keynote lecture)

18. Stochastic and multimode sensors based on porphyrins. New trends and applications in biomedical analysis.
R.I. Stefan-van Staden
8th International Conference on Porphyrins and Phthalocyanines (ICPP-8), Istanbul, Turkey, June 22-27, 2014 (Keynote lecture)

19. Stochastic sensors - new tools for screening in biomedical analysis
R.I. Stefan-van Staden
The 3rd International Conference on Analytical and Nanoanalytical Methods for Biomedical and Environmental Sciences, "IC-ANMBES 2014", Brasov, Romania, June 13-15, 2014 (Plenary lecture)

20. Novel stochastic sensor for simultaneous assay of neurotransmitters
R.I. Stefan-van Staden, I. Moldoveanu, J.F. van Staden
French-Romanian Meeting-FRM, Brasov, Romania, June 15, 2014 (Invited lecture)

21. Utilization of macromolecular compounds for the molecular recognition of substances of clinical interest
R.I. Stefan-van Staden
A XXV-a sesiune de comunicări ştiinţifice PROGRESE ÎN STIINłA COMPUSILOR ORGANICI SI MACROMOLECULARI, Iasi, Romania, September 24-26, 2015 (Keynote lecture)

22. New Stochastic Sensors Based on Nanostructured Materials for Fast Screening of Biological Fluids for Cancer Biomarkers
R.I. Stefan-van Staden
3rd International Conference on Smart Systems Engineering 2015 (SmaSys 2015), Yonezawa, Japan, October 8-9, 2015 (Keynote lecture)

23. A new approach in biomedical analysis
R.I. van Staden.
International Conference on Analytical and Nanoanalytical Methods for Biomedical and Environmental Sciences "IC-ANMBES 2016", Brasov, Romania, 29June- 1 July 2016 (Key note presentation)

24. Point-of-care screening tools for cancer
RI van Staden
229th ECS MEETING, May 29-June 2, 2016, San Diego, CA, USA (invited lecture)

25. Stochastic sensors as screening tools for biomedical analysis
RI Stefan-van Staden
ETCMOS 2017, Warsaw, Poland, May 28-30, 2017 (Keynote lecture)

26. Molecular Diagnosis – a Chance for Life
Raluca-Ioana Stefan-van Staden
41st ARA Congres, August 1-5, 2017, Sinaia, Romania (Keynote lecture)

27. SCREENING-UL LA NIVEL MOLECULAR – O SANSA LA VIATA!
RI Stefan-van Staden
Zilele Academice Iesene, Iasi, Romania, 5-6 Octombrie 2017, (Opening Plenary Lecture)

28. STOCμSENS-MD – A TEST FOR LIFE
RI Stefan-van Staden
10th Synevo Clinica Research Symposium, Bucharest, Romania November 9, 2018 (Plenary lecture)

Invited lectures in the past 5 years

29 Supramolecular Assemblies Recognized Gastric Cancer Biomarkers in Biological Fluids
RI Stefan-van Staden
235th Meeting of ECS, Dallas, USA, May-June 2019 (Invited lecture)

30. Stochastic sensors as screening tools for fast and early detection of illnesses
RI Stefan-van Staden
235th Meeting of ECS, Dallas, USA, May-June 2019 (keynote lecture)

31. New Trends in Molecular Recognition of Substances of Biological Importance
RI Stefan-van Staden
EUROANALYSIS, Istanbul, Turkey, September, 2019 (Invited lecture)

32. New Trends in Molecular Recognition of Substances of Biological Importance
RI Stefan-van Staden
43rd ARA Congress, Los Angeles, USA, November 15-17, 2019 (plenary lecture)

33. Noi metode si biomarkeri pentru diagnosticarea precoce a cancerului gastric
RI Stefan-van Staden
Institutul Petru Poni, Iasi, 11 noiembrie 2019, Conferinta invitata.

34. Fast screening tests for early detection of gastric cancer
RI Stefan-van Staden, RM Ilie-Mihai, DC Gheorghe
ECS Meeting Prime 2020, Honolulu, 4-9 October 2020 (invited lecture)

35. Quality and Reliability in Analytical Chemistry
Raluca-Ioana Stefan-van Staden
Virtual EURACHEM Workshop, Bucharest, July 14-15, 2020 (plenary lecture)

36. Fast Screening Tests for Early Diagnosis of Gastric Cancer, Based on Molecular Recognition and Assay of Maspin in Biological Samples
Raluca-Ioana Stefan-van Staden, Ruxandra Maria Ilie-Mihai, Damaris Cristina Gheorghe, Iuliana Mihaela Bogea
240th ECS Meeting, Volume MA2021-02, M02: Biosensors and Nanoscale Measurements: A Symposium in Honor of Professors Nongjian Tao and Stuart Lindsay, 10-14 October, 2021, Orlando, FL, USA (digital event) (invited lecture)

37. New challenges in early diagnosis of gastric cancer
RI Stefan-van Staden, DC Gheorghe, AA Bratei, RM Ilie-Mihai
241st ECS Meeting, May 29 – June 2, 2022, Vancouver, BC, Canada (keynote lecture)

38. Innovative methods for food analysis
RI Stefan-van Staden
5th International Conference Food Science & Nutrition, Dubai, 4-5 September 2023

Patents awarded:

1. Procedure for construction of stochastic sensors based on porphyrines and diamond or graphite for the assay of ascorbic acid at molecular level
   Raluca-Ioana van Staden, Eugenia Lenuta Fagadar-Cosma
   OSIM Nr 123101/Octombrie 2010.

2. STOC-μSENS-CMD
   Raluca-Ioana van Staden, Jacobus Frederick van Staden
   OSIM Nr 125050/Decembrie 2010.

3. Screening method and system for biomedical analysis and procedure of its construction
   Raluca-Ioana van Staden, Jacobus Frederick van Staden
   OSIM Nr 126898/December 2011, and **WIPO/PCT** nr WO2012/108780A1

4. DOT sensor enantioselective and procedure for its construction
   Raluca-Ioana van Staden, Jacobus Frederick van Staden
   OSIM Nr 126158/Iulie 2016.

5. Disposable multimode minicell
   Raluca-Ioana van Staden, Jacobus Frederick van Staden
   OSIM Nr. RO131898B1/2021.

Research Projects awarded to Raluca-Ioana van Staden (Born Stefan) as project director/manager:

1. *"Electrochemical sensors for bioanalysis"*, grant awarded by **National Research Foundation from South Africa**, **2001-2006**, **200,000Euro**. – more than 130 papers published
2. **PNII, Partnership**, *"Sensors and microsensors based on porphyrins for the assay of pharmaceutical compounds, of the compounds of clinical relevance and of food"*, CNMP, **October 2007 – September 2010, 2,000,000lei/400,000Euro** – more than 14 papers published and two awarded patents; the patents were awarded with gold medals and special prizes in international fairs of invention and innovation, from which the highest prize was the one obtained at the international fair in Geneva, 2010: **Gold Medal with the congratulations of the jury, WIPO award for the best woman inventor, and AGEPI medal**
3. **PN-II-ID-PCE-2011-3-0570**, "Stochastic microsensors as new tools for the assay of substances of biological importance", UEFISCDI, **October 2011 – September 2014**, **1,500,000lei/300,000Euro** - more than 27 papers published
4. **PNIII, PED**, **January 2017-July 2018** "Fast diagnosis of leukemia using stochastic sensors", **300,000lei/60,000Euro** – more than 5 papers published
5. **ERC-like project**, "Stochastic approach for early diagnosis of cancer", UEFISCDI, July 2012 – June 2014, **1,500,000lei/300,000Euro** – more than 25 papers.
6. Project responsible, **FP7, DENAMIC**, 2011-2015„Developmental neurotoxicity assessment of mixtures in children", CE, **70000Euro**. Responsible with development of tools based on stochastic sensing for the assay of 7 (and more) neurotransmitters and biomarkers – 10 papers published.
7. **Bilateral Romania-Cyprus**, „Enantioanalysis of compounds of clinical importance using microsensors and micellar electrokinetic chromatography", **May 2010-April 2012, 40000lei/8,000Euro** – 4 papers published
8. **Bilateral Romania-Republica Moldova**, „Detection and inhibition of cancer at the molecular level", **September 2010-November 2012**, ANCS, **32,600lei/6,520Euro**. – 2 papers published
9. **Bilateral Romania-Cyprus**, „Early detection of thyroid cancer using stochastic sensing and capillary zone electrophoresis", 2014-2015, ANCS, **6,000lei/1,200Euro** – 4 papers published
10. **PN-II-PT-PCCA-2013-4-1097**, Multimode sensors for screening tests for colorectal cancer, and for personalized treatment", **2014-2016**, UEFISCDI: **1,000,000lei/200,000Euro** – 25 papers published

For the past 5 years (Since 2019 to date):

11. **PN-III-P4-ID-PCE-2016-0120, 2017-2019** Early detection of diabetes using stochastic sensors, **850,000lei/170,000Euro** – 20 papers published.
12. **PN-III-P4-ID-PCCF-2016-0006, 2018-2022,** Graphene-based stochastic sensors for molecular diagnosis of upper gastro-intestinal cancer, **8,500,000lei/1,700,000Euro** – 75 papers published to date and 1 patent.
13. **Nucleus project, PN 23 27 03 01:** Electrochemical, enantioselective, inovative platforms for fast and early diagnostic of cancer, **2023-2026, 7.067.887lei/1,413,578Euro,** to date 5 papers accepted in ISI journals, and 10 papers submitted for publication.

All projects were evaluated with the degree: Excellent at the end of the project.

Raluca-Ioana (b. Stefan) van Staden

Published papers/books/chapters in books

A total number of 112 papers were published in journals found in Q1 zone; from these, 25 papers were published in the past 5 years in journals found in Q1 zone.

A value of the indicator: $\sum_{1}^{394}\frac{AIS}{n_i} = 131.152965$ was obtained for the papers published since the begining of the research career.

For the past 5 years, the value calculated for this indicator was: $\sum_{261}^{394}\frac{AIS}{n_i} = 37.9101$.

134 papers and 4 chapters in books were published in the past 5 years.

The most relevant papers published in the past 5 years are:

In the field of biomedical analysis:

- **The papers related to early diagnosis of diabetes: nr. 269, 271, 287, 345 (see the Table below)**
- **The papers related to early diagnosis of cancer based on utilisation of stochastic sensors as screening tools: nr. 279, 285, 290, 296, 299, 307, 310, 328, 349, 353, 369, 377, 379 (see the Table below)**

In the field of pharmaceutical analysis: nr. 351, 364, 370 (see the Table below)

In the field of food analysis: nr. 266, 275, 277, 342, 361, 383 (see the Table below)

	Papers published in journals			
Nr.	**Journal**	**Title of the paper**	**Authors**	$\frac{AIS}{n_i}$
1	Rev. Roum. Chim., 36(4-7), 727-740, 1991.	Carbonic anhydrase inhibitors. Novel coordination compounds of Pd(II), Pt(II) and Ni(II) with 6-ethoxy-benzothiazole-2-sulfonamide	M. Andruh, E. Cristurean, R. Stefan and C.T. Supuran	-
2	Rev. Roum. Chim., 36(9-10), 1175-1190, 1991.	Carbonic anhydrase inhibitors. Complexes of ethoxzolamide with lantanides are powerful inhibitors of isozymes I and II	C.T. Supuran, R. Stefan, Gh. Manole, I. Puscas and M. Andruh	-
3	Anal. Lett., 26(10), 2095-2105, 1993. https://doi.org/10.1080/00032719308017454	Penbutolol selective membrane sensor	M.S. Ionescu, R.I. Stefan, G.E. Baiulescu, A.A. Bunaciu, V.V. Cosofret and H.Y. Aboul-Enein	0.0858

4	Anal. Lett., 27(9), 1647-1658, 1994. https://doi.org/10.1080/00032719408007424	Mianserin ion-selective membrane electrode and its pharmaceutical applications	A.A. Bunaciu, M.S. Ionescu, R.I. Stefan, I.Ioan and H.Y. Aboul-Enein	0.103
5	Rev. Chim. (Bucharest), 45(10), 837-843, 1994.	Imipramine-selective membrane electrode. Its utilization to imipramine tablets control.	R.I. Stefan, G.E. Baiulescu, M.S. Ionescu, I. Enachescu, A.A. Bunaciu and V.V. Cosofret	-
6	Anal. Lett., 28(5), 835-843, 1995. https://doi.org/10.1080/00032719508001428	Solvent extraction of amino acids with crown ethers and Cryptand 222	L. Mutihac, D.O. Popescu and R.I. Stefan	0.1716
7	Anal. Lett., 28(6), 991-1004, 1995. https://doi.org/10.1080/00032719508002674	Mexiletine selective membrane electrode and its pharmaceutical applications	R.I. Stefan and M.S. Ionescu	0.2575
8	Anal. Lett., 29(1), 35-42, 1996. https://doi.org/10.1080/00032719608000390	Metomidate-sensing electrode and its pharmaceutical applications	R.I. Stefan and H.Y. Aboul-Enein	0.2575
9 Q1	Talanta, 43(7), 1171-1175, 1996. https://doi.org/10.1016/0039-9140(96)01866-8	Moclobemide selective membrane electrode and its pharmaceutical applications	R.I. Stefan, G.E. Baiulescu and H.Y. Aboul-Enein	0.569
10	Anal. Lett., 29(13), 2333-2346, 1996. https://doi.org/10.1080/00032719608002255	Disopyramide-selective membrane electrode	R.I. Stefan and H.Y. Aboul-Enein	0.2575
11 Q1	Sens. Actuators B, 37(3), 141-144, 1996. https://doi.org/10.1016/S0925-4005(97)80129-3	Amiodarone-selective membrane electrode	R.I. Stefan, H.Y. Aboul-Enein and G.E. Baiulescu	0.7076

12	Analusis, 25(2), 39-42, 1997.	Flecainide-selective membrane electrodes	R.I. Stefan, G.E. Baiulescu and H.Y. Aboul-Enein	-
13	Instrum. Sci. & Technol., 25(2), 169-173, 1997. https://doi.org/10.1080/10739149709351458	Ion-selective membrane electrodes: membrane configuration	R.I. Stefan and H.Y. Aboul-Enein	0.2565
14	Pharmazie, 52(10), 780-783, 1997.	Tamoxifen-selective membrane electrodes	R.I. Stefan, G.E. Baiulescu and H.Y. Aboul-Enein	0.170
15 Q1	Anal. Chim. Acta, 350(1-2), 105-108, 1997. https://doi.org/10.1016/S0003-2670(97)00313-9	Lauryl sulphate as counter ion for construction of ion-selective membrane electrodes for moclobemide and disopyramide	R.I. Stefan	2.011
16 Q1	Crit. Rev. Anal. Chem., 27(4), 307-321, 1997. https://doi.org/10.1080/10408349708050589	Ion-selective membrane electrodes in pharmaceutical analysis	R.I. Stefan, G.E. Baiulescu and H.Y. Aboul-Enein	0.544
17	J. Anal.Chem., 53(6), 551-553, 1998.	Taxol-selective membrane electrodes	R.I. Stefan and H.Y. Aboul-Enein	0.1485
18	Accred. Qual. Assur., 3, 194-196, 1998. https://doi.org/10.1007/s007690050221	Validation criteria for developing ion-selective membrane electrodes for analysis of pharmaceuticals	R.I. Stefan and H.Y. Aboul-Enein	0.142
19	Anal. Lett., 31(11), 1787-1794, 1998. https://doi.org/10.1080/00032719808005262	A new construction for a potentiometric, enantioselective membrane electrode and use for L-proline assay	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.1716
20	Crit. Rev. Anal. Chem., 28(3), 259-266, 1998.	Enantioselective sensors and biosensors in the analysis of chiral drugs	H.Y. Aboul-Enein and R.I. Stefan	0.816

Q1	https://doi.org/10.1080/10408349891194199			
21	Current Trends Anal. Chem., 1(1), 135-138, 1998.	The opportunity to use amperometric biosensors for enantioselective analysis of angiotensin converting enzyme inhibitors	R.I. Stefan, G.L. Radu, H.Y. Aboul-Enein and G.E. Baiulescu	-
22	Prep. Biochem. & Biotechnol., 28(4), 305-312, 1998. https://doi.org/10.1080/10826069808010143	Biosensors for the enantioselective analysis of S-enalapril and S-ramipril	R.I. Stefan, H.Y. Aboul-Enein and G.L. Radu	0.214
23	Instrum. Sci. & Technol., 27(2), 105-110, 1999. https://doi.org/10.1080/10739149908085836	Ion-selective membrane electrodes based on ion-pair complexes: correlation between slopes and stability of ion-pair complexes	R.I. Stefan and H.Y. Aboul-Enein	0.2565
24 Q1	Talanta, 48(5), 1139-1143, 1999. https://doi.org/10.1016/S0039-9140(98)00335-X	A new construction for a potentiometric, enantioselective membrane electrode. Its utilization to the S-captopril assay.	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.569
25	Analusis, 27(1), 53-56, 1999. https://doi.org/10.1051/analusis:1999105	Potentiometric, enantioselective membrane electrodes for S-enalapril assay	H.Y. Aboul-Enein, R.I. Stefan and J.F. van Staden	-
26	Seminars in Food Analysis, 4(1), 31-37, 1999. https://www.semanticscholar.org/paper/Analysis-of-L-and-D-ascorbic-acid-in-fruits-and-by-Aboul%E2%80%90Enein-Al-Duraibi/40ff9da08f6b9e22	Analysis of L- and D-ascorbic acid in fruits and fruit drinks by HPLC	H.Y. Aboul-Enein, I.A. Al-Duraibi, R.I. Stefan, C. Radoi and A. Avramescu	-

	4e9fabbbf11f1e6e7964703f			
27	Prep. Biochem. & Biotechnol., 29(1), 55-61, 1999. https://doi.org/10.1080/10826069908544693	Biosensors for the enantioselective analysis of S-perindopril	H.Y. Aboul-Enein, R.I. Stefan and G.L. Radu	0.214
28	Anal. Lett., 32(3), 447-455, 1999. https://doi.org/10.1080/00032719908542832	The construction of an amperometric immunosensor for the thyroid hormone (+)-3,3',5-triiodo-L-thyronine (T_3)	H.Y. Aboul-Enein, R.I. Stefan, G.L. Radu and G.E. Baiulescu	0.12875
29	Anal. Lett., 32(4), 623-632, 1999. https://doi.org/10.1080/00032719908542844	Analysis of several angiotensin-converting enzyme inhibitors using potentiometric, enantioselective membrane electrodes	H.Y. Aboul-Enein, R.I. Stefan and J.F. van Staden	0.12875
30	Pharm. Developm. Technol., 4(2), 251-255, 1999. https://doi.org/10.1081/PDT-100101359	Biosensor for the enantioselective analysis of S-cilazapril, S-trandolapril and S-pentopril	H.Y. Aboul-Enein, R.I. Stefan and G.L. Radu	0.228
31 Q1	Sens. Actuators B, 54(3), 261-265, 1999. https://doi.org/10.1016/S0925-4005(99)00114-8	Determination of S-perindopril using a flow injection system with an amperometric biosensor	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.7076
32	S Afr.J. Chem., 52 (1) (1999) 24 - 26. https://hdl.handle.net/10520/AJA03794350_1835	On-line monitoring of calcium in natural and borehole water with a flow injection system using a calcium-selective membrane electrode	J.F. van Staden and R.I. Stefan	0.208
33	Instrum. Sci. & Technol., 27(2), 89-93, 1999.	The opportunity to use ion-selective membrane electrodes for dissolution tests	H.Y. Aboul-Enein and R.I. Stefan	0.2565

	https://doi.org/10.1080/10739149908085836			
34 Q1	Crit. Rev. Anal. Chem., 29(2), 133-153, 1999. https://doi.org/10.1080/10408349891199293	Electrochemical sensor arrays	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.544
35	Accred. Qual. Assur., 4(6), 225-229, 1999. https://doi.org/10.1007/s007690050356	Estimation of uncertainties in clinical analysis	R.I. Stefan, G.E. Baiulescu, H.Y. Aboul-Enein and J.F. van Staden	0.071
36	Electroanalysis, 11(3), 192-194, 1999. https://doi.org/10.1002/(SICI)1521-4109(199903)11:3<192::AID-ELAN192>3.0.CO;2-O	Detection of S-enantiomer of cilazapril, pentopril and trandolapril using potentiometric, enantioselective membrane electrode	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.264
37	Chemia Analityczna, 44(3), 417-422, 1999. https://yadda.icm.edu.pl/yadda/element/bwmeta1.element.baztech-volume-0009-2223-chemia_analityczna-1999-vol__44_no__3a	Enantioselective membrane electrode for S-ramipril assay	R.I. Stefan, J.F. van Staden, G.E. Baiulescu and H.Y. Aboul-Enein	-
38	Chirality, 11(8), 631-634, 1999. https://doi.org/10.1002/(SICI)1520-636X(1999)11:8<631::AID-CHIR4>3.0.CO;2-K	S-perindopril assay using a potentiometric, enantioselective membrane electrode	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.388
39	Saudi Pharm. J., 7(2), 103-110, 1999.	The reliability of the sampling process for the trace atmospheric constituents	R.I. Stefan, H.Y. Aboul-Enein and G.E. Baiulescu	0.305

40	Pharm. Acta Helv., 73(6), 307-310, 1999. https://doi.org/10.1016/S0031-6865(99)00008-4	Determination of fluoride in toothpaste, effluents streams and natural and borehole water using a flow injection system with a fluoride-selective membrane electrode	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	-
41	Electroanalysis, 11(16), 1233-1235, 1999. https://doi.org/10.1002/(SICI)1521-4109(199911)11:16<1233::AID-ELAN1233>3.0.CO;2-F	Analysis of chiral drugs with enantioselective biosensors. An overview.	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.264
42 Q1	Talanta, 49(5), 1017-1022, 1999. https://doi.org/10.1016/S0039-9140(99)00060-0	Simultaneous flow injection analysis of calcium and fluoride in natural and borehole water with conventional ion-selective electrodes in series	J.F. van Staden and R.I. Stefan	0.8535
43 Q1	Crit. Rev. Anal. Chem., 29(4), 323-331, 1999. https://doi.org/10.1080/10408349891199338	Chemiluminescence-based (bio)sensors	H.Y. Aboul-Enein, R.I. Stefan and J.F. van Staden	0.544
44	NOESIS, 24, 159-163, 1999.	Nicolae Teclu one of the founders of the spectrometric techniques	G.E. Baiulescu and R.I. Stefan	-
45	Fresenius J. Anal. Chem., 366(6/7), 659-668, 2000. https://doi.org/10.1007/s002160051560	Immunosensors in clinical analysis	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.478
46	Fresenius J. Anal. Chem., 367(2), 178-180, 2000. https://doi.org/10.1007/s002160051620	Amperometric biosensors based on D-amino acid oxidase for R-perindopril assay	J.F. van Staden, R.I. Stefan and H.Y. Aboul-Enein	0.478
47 Q1	Talanta, 51(5), 969-975, 2000.	Simultaneous determination of S- and R-captopril using sequential injection analysis	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.569

	https://doi.org/10.1016/S0039-9140(00)00282-4			
48 Q1	Biosens. Bioelectron., 15(1-2), 1-5, 2000. https://doi.org/10.1016/S0956-5663(99)00075-5	An amperometric biosensors/SIA system for the simultaneous determination of S- and R-captopril	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	1.174
49 Q1	Talanta, 52(1), 3-11, 2000 https://doi.org/10.1016/S0039-9140(99)00359-8	Evaluation of different SIA systems using an electrochemical sensor as detector	J.F. van Staden, R.I. Stefan and S. Birghila	0.569
50 Q1	Sens. Actuators B, 65(1-3), 250-252, 2000. https://doi.org/10.1016/S0925-4005(99)00344-5	Determination of urinary oxalate using oxalate-selective membrane electrodes	R.I. Stefan, I. Draghici and G.E. Baiulescu	0.7076
51 Q1	Anal. Chim. Acta, 411(1-2), 51-56, 2000. https://doi.org/10.1016/S0003-2670(00)00780-7	On-line assay of S-captopril using an amperometric biosensor/SIA system	J.F. van Staden, R.I. Stefan and H.Y. Aboul-Enein	0.670
52	Combinatorial Chemistry & High Throughput Screening, 3(6), 445-454, 2000. https://doi.org/10.2174/1386207003331382	Design and use of electrochemical sensors in enantioselective high throughput screening of drugs	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.1986
53 Q1	Crit. Rev. Anal. Chem., 30(4), 271-289, 2000. https://doi.org/10.1080/10408340008984161	Recent developments and applications of chemiluminescence sensors	R.I. Stefan, H.Y. Aboul-Enein, J.F. van Staden, X.R. Zhang, A.M. Garcia-Campana and W.R.G. Bayens	0.3264
54	Crystal Engineering, 4, 113-118, 2001. https://doi.org/10.1016/S1463-0184(00)00047-2	Molecular recognition in chiral discrimination	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	-

55	Fresenius J. Anal. Chem., 370(1), 33-37, 2001. https://doi.org/10.1007/s002160100741	Maltodextrins as new chiral selectors in potentiometric enantioselective, membrane electrodes design	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.4786
56	Pure and Appl. Chem., 73(8), 1381-1386, 2001. http://dx.doi.org/10.1351/pac200173081381	Selectivity in analytical chemistry. Recommendations for its use.	J. Vessman, R.I. Stefan, J.F. van Staden, A. Fajgel, K. Danzer, W. Lindner, H. Muller and D.T. Burns	0.112375
57	Prep. Biochem. Biotechnol., 32(2), 135-142, 2002. https://doi.org/10.1081/PB-120004126	A bienzymatic amperometric sensor for proteins assay in milk	R.I. Stefan, M.A. Makhafola and J.F. van Staden	0.2143
58	S. Afr. J. Chem., 55, 39-51, 2002. https://hdl.handle.net/10520/EJC23666	On-line determination of hydrochloric acid in process effluent streams by potentiometric sequential injection acid-base titration	J.F. van Staden, M.G. Mashamba and R.I. Stefan	0.1386
59	J. Immunoassay Immunochem., 23(2), 181-190, 2002. https://doi.org/10.1081/IAS-120003660	Biosensors for the enantioselective analysis of the thyroid hormones L-triiodothyronine (T_3) and L-tetraiodothyronine (T_4)	H.Y. Aboul-Enein, R.I. Stefan, S. Litescu and G.L. Radu	-
60 Q1	Anal. Chim. Acta, 467, 189-195, 2002. https://doi.org/10.1016/S0003-2670(02)00089-2	On-line simultaneous determination of S- and R-perindopril using amperometric biosensors as detectors in flow systems	R.I. Stefan, J.F. van Staden, L.V. Mulaudzi and H.Y. Aboul-Enein	0.50275
61 Q1	Anal. Chim. Acta, 467, 35-49, 2002. https://doi.org/10.1016/S0003-2670(02)00128-9	On-line speciation of iron(II) and iron(III) using a spectrophotometric sequential injection system	L.V. Mulaudzi, J.F. van Staden and R.I. Stefan	0.670
62	J. Immunoassay Immunochem., 23(4), 429-437, 2002.	The construction of an amperometric immunosensor for the thyroid hormone (+)-3,3'5,5'-tetraiodo-L-thyronine	R.I. Stefan and H.Y. Aboul-Enein	-

	https://doi.org/10.1081/IAS-120015474			
63	Instrum. Sci. & Technol., 30(3), 243-250, 2002. https://doi.org/10.1081/CI-120005489	On-line monitoring of R-captopril using an amperometric biosensor/SIA system	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.171
64 Q1	Anal. Chim. Acta, 467, 51-60, 2002. https://doi.org/10.1016/S0003-2670(02)00188-5	Speciation of chromium(III) and chromium(VI) by use of a spectrophotometric sequential injection system	L.V. Mulaudzi, J.F. van Staden and R.I. Stefan	0.670
65	Pure and Appl. Chem., 74, 585-592, 2002. http://dx.doi.org/10.1351/pac200274040585	Information essential for characterizing a flow-based analytical system	E.A.G. Zagatto, J.F. van Staden, N. Maniasso, G.D. Marshall and R.I. Stefan	0.1798
66 Q1	Talanta, 58(6), 1089-1094, 2002. https://doi.org/10.1016/S0039-9140(02)00206-0	On-line dilution and determination of the amount of concentrated hydrochloric acid in the final products from a hydrochloric acid production plant using a sequential injection titration system	J.F. van Staden, M.G. Mashamba and R.I. Stefan	0.569
67 Q1	Talanta, 58(6), 1109-1114, 2002. https://doi.org/10.1016/S0039-9140(02)00408-3	Determination of the total acidity in soft drinks using potentiometric sequential injection titration analysis	J.F. van Staden, M.G. Mashamba and R.I. Stefan	0.569
68	Anal. Bioanal. Chem., 374, 3-12, 2002. https://doi.org/10.1007/s00216-002-1441-5	New horizons in sequential injection kinetic analysis	J.F. van Staden and R.I. Stefan	0.718
69	Anal. Bioanal. Chem., 374, 141-144, 2002. https://doi.org/10.1007/s00216-002-1462-0	An on-line potentiometric sequential injection titration process analyzer for the determination of acetic acid	J.F. van Staden, M.G. Mashamba and R.I. Stefan	0.4786
70	Accred. Qual. Assur., 8(2), 86-89, 2003	Estimation of uncertainties for the application of electrochemical sensors in clinical analysis	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.0946

	https://doi.org/10.1007/s00769-002-0560-1			
71 Q1	Talanta, 59(5), 883-887, 2003. https://doi.org/10.1016/S0039-9140(02)00644-6	Immunosensor for the determination of azidothymidine. Its utilization as detector in a sequential injection analysis system.	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.42675
72	Anal. Lett., 36(6), 1089-1100, 2003. https://doi.org/10.1081/AL-120020145	Determination of L- and D-enantiomers of carnitine using amperometric biosensors	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.12875
73 Q1	Crit. Rev. Anal. Chem., 33(2), 145-153, 2003. https://doi.org/10.1080/713609159	Polycrystalline diamond based electrochemical sensors and their applications in inorganic and organic analysis	S.G. Bairu, R.I. Stefan and J.F. van Staden	0.544
74	Anal. Lett., 36(8), 1493-1500, 2003. https://doi.org/10.1081/AL-120021531	Diamond paste based electrodes for the determination of iodide in vitamins and table salt	R.I. Stefan, S.G. Bairu and J.F. van Staden	0.1716
75 Q1	Sens. Actuators B, 92(1-2), 228-231, 2003. https://doi.org/10.1016/S0925-4005(03)00268-5	Biosensors for enantioselective analysis of S-captopril	R.I. Stefan, C. Bala and H.Y. Aboul-Enein	0.7076
76	Instrum. Sci. & Technol., 31(3), 261-167, 2003. https://doi.org/10.1081/CI-120022653	Diamond paste based electrodes for the determination of Cr(VI) at trace levels	R.I. Stefan and S.G. Bairu	0.2565
77	Instrum. Sci. & Technol., 31(2), 183-188, 2003. https://doi.org/10.1081/CI-120020230	Determination of creatine and creatinine using a diamond paste based electrode	R.I. Stefan and R.G. Bokretsion	0.2565
78	Prep. Biochem. Biotechnol., 33(3), 163-171, 2003.	Biosensors for the determination of ortho-acetyl-L-carnitine. Their utilization as detectors in a	R.I. Stefan, R.G. Bokretsion, J.F. van	0.16075

	https://doi.org/10.1081/PB-120022985	sequential injection analysis system	Staden and H.Y. Aboul-Enein	
79	J. Immunoassay Immunochem., 24(3), 319-324, 2003. https://doi.org/10.1081/IAS-120022941	Diamond paste based immunosensor for the determination of azidothymidine	R.I. Stefan and R.G. Bokretsion	-
80 Q1	Talanta, 60(5), 983-990, 2003. https://doi.org/10.1016/S0039-9140(03)00177-2	Determination of L- and D-enantiomers of methotrexate using amperometric biosensors	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.42675
81	Anal. Bioanal. Chem., 375(8), 1074-1082, 2003. https://doi.org/10.1007/s00216-003-1814-4	On-line speciation of bromine and bromide by using sequential injection analysis with spectrophotometric detection	J.F. van Staden, L.V. Mulaudzi and R.I. Stefan	0.4786
82	Anal. Bioanal. Chem., 376(6), 844-847, 2003. https://doi.org/10.1007/s00216-003-1974-2	Diamond paste based electrodes for the determination of Cr(III) in pharmaceutical compounds	R.I. Stefan, S.G. Bairu and J.F. van Staden	0.4786
83 Q1	Talanta, 60(6), 1223-1228, 2003. https://doi.org/10.1016/S0039-9140(03)00230-3	Simultaneous determination of creatine and creatinine using amperometric biosensors	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.42675
84	J. Pharm. Biomed. Anal., 33(2), 323-328, 2003. https://doi.org/10.1016/S0731-7085(03)00284-X	Simultaneous determination of L- and D-carnitine using a sequential injection analysis/amperometric biosensors system	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.27075
85 Q1	Sens. Actuators B, 94(3), 271-275, 2003. https://doi.org/10.1016/S0925-4005(03)00366-6	Biosensors for the enantioselective analysis of pipecolic acid	R.I. Stefan, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.53075
86 Q1	Biosens. Bioelectron., 19(3), 261-267, 2003. https://doi.org/10.1016/S0956-5663(03)00210-0	Simultaneous determination of L- and D-methotrexate using a sequential injection analysis/amperometric biosensors system	R.I. Stefan, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.8805

87	Instrum. Sci. & Technol., 31(4), 411-416, 2003. https://doi.org/10.1081/CI-120025575	Determination of Fe(III) in water samples using diamond paste based electrodes	R.I. Stefan, S.G. Bairu and J.F. van Staden	0.171
88	Anal. Lett., 36(12), 2635-2644, 2003. https://doi.org/10.1081/AL-120024638	Determination of L- and D-pipecolic acid using diamond paste based amperometric biosensors	R.I. Stefan and R.M. Nejem	0.2575
89 Q1	Analytical Chemistry, 75(20), 5394-5398, 2003. https://doi.org/10.1021/ac026300b	Monocrystalline diamond paste based electrodes and their applications for the determination of Fe(II) in vitamins	R.I. Stefan and S.G. Bairu	1.4025
90	Sensor Letters, 1(1), 71-74, 2003. https://doi.org/10.1166/sl.2003.014	New enantioselective, potentiometric membrane electrodes based on C_{70} fullerenes as chiral selectors	R.I. Stefan	-
91 Q1	Anal.Chim.Acta, 499(1-2), 129-137, 2003. https://doi.org/10.1016/S0003-2670(03)00883-3	Speciation of Mn(II) and Mn(VII) by on-line spectrophotometric sequential injection analysis	J.F. van Staden, L.V. Mulaudzi and R.I. Stefan	0.670
92 Q1	Talanta, 62(4), 681-685, 2004. https://doi.org/10.1016/j.talanta.2003.08.035	Utilization of maltodextrin based enantioselective, potentiometric membrane electrodes for the enantioselective assay of S-perindopril	K.I. Ozoemena, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.42675
93	Instrum.Sci. & Technol., 32(3), 311-320, 2004. https://doi.org/10.1081/CI-120030543	Determination of L and D-pipecolic acids using a diamond paste based electrode	R.I. Stefan, R.M. Nejem	0.2565
94 Q1	Talanta, 63(3), 605-608, 2004. https://doi.org/10.1016/j.talanta.2003.12.023	Diamond paste based electrodes for the determination of Pb(II) at trace concentration levels	R.I. Stefan and S.G. Bairu	0.8535
95 Q1	Sens.Actuators B, 98(1), 97-100, 2004. https://doi.org/10.1016/j.snb.2003.09.029	Enantioselective, potentiometric membrane electrodes based on maltodextrins. Their applications for determination of L-Proline.	K.I. Ozoemena and R.I. Stefan	1.0615

96 Q1	Talanta, 63(3), 515-519, 2004. https://doi.org/10.1016/j.talanta.2003.11.036	Determination of L-carnitine using enantioselective, potentiometric membrane electrodes based on macrocyclic antibiotics	AA. Rat'ko, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.42675
97	J. Immunoassay Immunochem., 25(2), 183-189, 2004. https://doi.org/10.1081/IAS-120030527	Determination of (+)-3,3',5-triiodo-L-thyronine (L-T_3) from serum using a sequential injection analysis/immunosensor system	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	-
98 Q1	Sens.Actuators B, 99(2-3), 539-543, 2004. https://doi.org/10.1016/j.snb.2004.01.004	Enantioselective, potentiometric membrane electrode based on vancomycin. Its application for the determination of D-pipecolic acid	A.A. Rat'ko, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.53075
99 Q1	Talanta, 64(1), 151-155, 2004. https://doi.org/10.1016/j.talanta.2004.01.024	Simultaneous determination of L-thyroxine (L-T_4), D-thyroxine (D-T_4) and L-triiodothyronine (L-T_3) using a sensors/sequential injection	R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.569
100	Prep.Biochem.&Biotechnol., 34(2), 135-143, 2004. https://doi.org/10.1081/PB-120030872	New amperometric biosensor based on diamond paste for the assay of L- and D-pipecolic acids in serum samples	R.I. Stefan, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.16075
101 Q1	Talanta, 64(1), 145-150, 2004. https://doi.org/10.1016/j.talanta.2004.01.022	Macrocyclic antibiotics as chiral selectors in the design of enantioselective, potentiometric membrane electrodes for the assay of L- and D-enantiomers of methotrexate	A.A. Rat'ko, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.42675
102	Electroanalysis, 20(16), 1730-1733, 2004. https://doi.org/10.1002/elan.200303022	Enantioselective, potentometric membrane electrodes for the determination of L-pipecolic acid in serum	R.I. Stefan, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.198
103	Instrum. Sci. & Technol., 32(4), 371-378, 2004. https://doi.org/10.1081/CI-120037669	Enantioselective, potentometric membrane electrode based on vancomycin as chiral selector, for the assay of S-perindopril	K.I. Ozoemena, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.12825

104	J.Pharm.Biomed.Anal., 36, 889-892, 2004. https://doi.org/10.1016/j.jpba.2004.08.017	On-line assay of the S-enantiomer of enalapril, ramipril and pentopril using a sequential injection analysis/amperometric biosensor system	R.I. Stefan, J.F. van Staden, C. Bala and H.Y. Aboul-Enein	0.27075
105	Instrum.Sci. & Technol., 32(6), 601-610, 2004 https://doi.org/10.1081/CI-200037017	Macrocyclic antibiotics as chiral selectors in the design of enantioselective, potentiometric membrane electrodes	A.A. Rat'ko, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.12825
106	Anal.Lett., 37(13), 2641-2648, 2004. https://doi.org/10.1081/AL-200031940	Determination of 2',3'-dideoxyinosine using iron(II) phthalocyanine modified carbon paste electrode	K.I. Ozoemena, R.I. Stefan and T. Nyokong	0.1716
107	Anal.Lett., 37(15), 3161-3173, 2004. https://doi.org/10.1081/AL-200040315	Teicoplanine-based enantioselective potentiometric membrane electrodes for the determination of R-baclofen in pharmaceutical formulations	A.A. Rat'ko and R.I. Stefan	0.2575
108	IL Farmaco, 59, 993-997, 2004.	Determination of baclofen enntiomers in pharmaceutical formulations using maltodextrin based enantioselective, potentiometric electrodes	A.A. Rat'ko and R.I. Stefan-van Staden	-
109	IL Farmaco, 59, 1005-1010, 2004.	Sequential injection spectrophotometric determination of etilefrine hydrochloride	N.W. Beyene, J.F. van Staden and R.I. Stefan	-
110 Q1	Talanta, 64(4), 981-988, 2004. https://doi.org/10.1016/j.talanta.2004.04.026	Spectrophotometric determination of magnesium in pharmaceutical preparations by cost-effective sequential injection analysis	Z.O. Tesfaldet, J.F. van Staden and R.I. Stefan	0.569
111 Q1	Talanta, 64(5), 1213-1219, 2004. https://doi.org/10.1016/j.talanta.2004.04.038	Sequential injection spectrophotometric determination of trace amounts of iodide by its catalytic effect on the 4,4'-methylenebis(N,N-dimethylalanine)chloamine-T reaction	Z.O. Tesfaldet, J.F. van Staden and R.I. Stefan	0.569

112 Q1	Anal.Chim.Acta, 521(2), 223-229, 2004. https://doi.org/10.1016/j.aca.2004.06.014	Determination of fenoterol hydrobromide by sequential injection analysis (SIA) with spectrophotometric detection	N.W. Beyene, J.F. van Staden and R.I. Stefan	0.670
113 Q1	Talanta, 64(5), 1109-1113, 2004. https://doi.org/10.1016/j.talanta.2004.05.042	Chemical speciation by sequential injection analysis (SIA) with spectrophotometric detection	J.F. van Staden and R.I. Stefan	0.8535
114 Q1	Talanta, 64(5), 1189-1195, 2004. https://doi.org/10.1016/j.talanta.2004.02.044	Sequential injection sectrophotometric determination of iron (II) in multi-vitamin preparations using 1,10-phenanthroline as complexing agent	Z.O. Tesfaldet, J.F. van Staden and R.I. Stefan	0.569
115 Q1	Talanta, 64(5), 1196-1202, 2004. https://doi.org/10.1016/j.talanta.2004.04.031	Spectrophotometric determination of bromate by sequential injection analysis	J.F. van Staden, L.V. Mulaudzi and R.I. Stefan	0.569
116 Q1	Talanta, 65(2), 437-440, 2005. https://doi.org/10.1016/j.talanta.2004.06.040	Enantioanalysis of L-hydroxyglutaric acid in urine samples using enantioselective, potentiometric membrane electrodes based on maltodextrins	R.M. Nejem, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.42675
117 Q1	Sens.Actuators B, 105(2), 425-429, 2005. https://doi.org/10.1016/j.snb.2004.06.032	Enantioanalysis of S-perindopril using different cyclodextrin-based potentiometric sensors	K.I. Ozoemena, R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein	0.53075
118 Q1	Sens.Actuators B, 106(2), 791-795, 2005. https://doi.org/10.1016/j.snb.2004.09.031	Determination of D-hydroxyglutaric acid in urine samples using enantioselective, potentiometric membrane electrodes based on antibiotics	R.I. Stefan, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.53075
119 Q1	Sens.Actuators B, 106(2), 736-740, 2005. https://doi.org/10.1016/j.snb.2004.09.025	Enantioanalysis of glyceric acid in urine samples using enantioselective, potentiometric membrane electrodes based on maltodextrins	R.I. Stefan and R.M. Nejem	1.0615

120 Q1	Talanta, 66(2), 501-504, 2005. https://doi.org/10.1016/j.talanta.2004.11.024	Enantioselective, potentiometric membrane electrodes based on α-, ß-, and γ-cyclodextrins as chiral selectors for the assay of L-proline	K.I. Ozoemena and R.I. Stefan	0.8535
121	IL Farmaco, 60, 613-619, 2005.	Determination of isoxsuprine hydrochloride by sequential injection visible spectrophotometry	N.W. Beyene, J.F. van Staden, R.I. Stefan and H.Y. Aboul-Enein	-
122	Anal.Lett., 38(12), 1847-1855, 2005. https://doi.org/10.1080/00032710500230830	Enantioselective, potentiometric membrane electrodes based on cyclodextrines for the assay of L- and D-hydroxyglutaric acids	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.12875
123 Q1	Talanta, 68(2), 401-405, 2005. https://doi.org/10.1016/j.talanta.2005.08.069	Sequential injection spectrophotometric determination of ritodrine hydrochloride using 4-aminoantipyrine	N.W. Beyene, J.F. van Staden, R.I. Stefan and H.Y. Aboul-Enein	0.42675
124 Q1	Talanta, 69(5), 1049-1053, 2006 https://doi.org/10.1016/j.talanta.2005.12.022	Enantioselective, potentiometric membrane electrodes based on cyclodextrins: application for the determination of R-baclofen in its pharmaceutical formulation	R.I. Stefan-van Staden and A.A. Rat'ko	0.8535
125	Instrum. Sci. & Technol., 34(4), 475-481, 2006. https://doi.org/10.1080/10739140600648886	Determination of L- and D-enantiomers of leucine usingamperometric biosensors	R.I. Stefan-van Staden and L.S. Muvhulawa	0.2565
126	Anal.Lett., 39(4), 675-682, 2006 https://doi.org/10.1080/00032710600609750	Determination of L-vesamicol in serum samples using enantioselective, potentiometric membrane electrodes based on antibiotic	R.I. Stefan-van Staden and R.M. Nejem	0.2575
127 Q1	Sens. Actuators B, 117(1), 123-127, 2006 https://doi.org/10.1016/j.snb.2005.11.007	Cyclodextrins based enantioselective, potentiometric membrane electrodes for L-vesamicol assay in serum samples	R.I. Stefan-van Staden and R.M. Nejem	1.0615

128	Anal.Lett, 39(6), 1065-1073, 2006 https://doi.org/10.1080/00032710600620401	Utilization of maltodextrins based enantioselective, potentiometric membrane electrodes for the enantioselective assay of S-flurbiprofen	R.I. Stefan-van Staden, R.G. Bokretsion and K.I. Ozoemena	0.1716
129	Anal.Lett., 39(7), 1311-1319, 2006 https://doi.org/10.1080/00032710600666396	Enantioselective, potentiometric membrane electrodes based on C_{60} fullerenes derivatives for the enantioanalysis of S-clenbuterol	R.I. Stefan-van Staden and B. Lal	0.1716
130 Q1	Sens.Actuators B, 120(1), 295-297, 2006 https://doi.org/10.1016/j.snb.2006.02.044	Enantioselective assay of S(+)-ibuprofen using enantioselective, potentiometric membrane electrodes based on maltodextrins	R.I. Stefan-van Staden and T. Mashile	1.0615
131	Anal.Lett., 39(11), 2227-2233, 2006 https://doi.org/10.1080/00032710600751016	Simultaneous determination of creatine and creatinine using monocrystalline diamond paste based amperometric biosensors	R.I. Stefan-van Staden and R.G. Bokretsion	0.2575
132	Electroanalysis, 18(17), 1718-1721, 2006 https://doi.org/10.1002/elan.200603574	Enantioselective, potentiometric membrane electrodes based on different cyclodextrines as chiral selectors for the assay of S-flurbiprofen	R.I. Stefan-van Staden, R.G. Bokretsion, K.I. Ozoemena, J.F. van Staden, H.Y. Aboul-Enein	0.1584
133	Prep.Biochem.Biotechnol., 36(4), 287-296, 2006 https://doi.org/10.1080/10826060600912393	Simultaneous detection of creatine and creatinine using a sequential injection analysis/amperometric biosensors system	R.I. Stefan-van Staden, R.G. Bokretsion, J.F. van Staden and H.Y. Aboul-Enein	0.16075
134 Q1	Sens. Actuators B, 120(2), 399-402, 2007 https://doi.org/10.1016/j.snb.2006.02.033	Enantioselective, potentiometric membrane electrodes based on cyclodextrines for the determination of L-histidine	R.I. Stefan-van Staden and L. Holo	1.0615
135	Instrum.Sci.Technol., 35(2), 117-123, 2007 https://doi.org/10.1080/10739140601126262	Determination of R-deprenyl using a maltodextrin based enantioselective, potentiometric membrane electrode	R.I. Stefan-van Staden, T.R. Mashile	0.2565

136 Q1	Talanta, 71(3), 1434-1437, 2007 https://doi.org/10.1016/j.talanta.2006.05.088	Enantioselective, potentiometric membrane electrodes based on C_{60} fullerenes and its derivatives for the assay of L-histidine	R.I. Stefan-van Staden, B. Lal and L. Holo	0.569
137	Instrum.Sci.Technol., 36(4), 355-368, 2008. https://doi.org/10.1080/10739140802151366	Sequential injection analysis utilizing amperometric biosensors as detectors for simultaneous determination of L- and D-pipecolic acid	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.12825
138	J. Immunoassay & Immunochem., 29(4), 348-355, 2008. https://doi.org/10.1080/15321810802329690	Determination of (+)-3,3',5,5'-tetraiodo-L-thyronine (L-T_4) in serum and in pharmaceutical formulations using a sequential injection analysis/immunosensor system	R.I. Stefan-van Staden, J.F. van Staden, H.Y. Aboul-Enein, M.C. Mirica, I. Balcu, N. Mirica	-
139	Anal.Lett. 42(2), 323-329, 2009 https://doi.org/10.1080/00032710802585733	Enantioanalysis of L-proline using C_{60} as chiral selectors	R.I. Stefan-van Staden	0.515
140	Anal.Lett., 42(5), 758-763, 2009. https://doi.org/10.1080/00032710902722012	Amperometric immunosensors for the determination of 2',3'-dideoxyinosine	R.I. Stefan-van Staden and K.I. Ozoemena	0.2575
141	Anal.Lett., 42(5), 764-774, 2009. https://doi.org/10.1080/00032710902722020	Enantioanalysis of S-ketoprofen using enantioselective, potentiometric membrane electrodes	R.I. Stefan-van Staden, N.S. Nhlapo, J.F. van Staden, H.Y. Aboul-Enein	0.12875
142	Anal.Bioanal.Chem., 394(3), 821-826, 2009. https://doi.org/10.1007/s00216-009-2742-8	Macrocyclic antibiotics as chiral selectors in the design ofenantioselective, potentiometric membrane electrodes for the determination of S-flurbiprofen	R.I. Stefan-van Staden, J.F. van Staden and H.Y. Aboul-Enein	0.4786
143	Prep.Biochem.Biotechnol., 39(2), 142-146, 2009.	Utilization of an Enantioselective Surface Plasmon Resonance Electrode for the Selection of the Best C_{70} Fullerene as Chiral	R.I. Stefan-van Staden, L. Holo	0.3215

	https://doi.org/10.1080/10826060902800304	Selector for the Enantioanalysis of L-Cysteine		
144	Electroanalysis, 21(14), 1651-1654, 2009. https://doi.org/10.1002/elan.200904581	Metallophthalocyanine based carbon paste electrodes for the determination of 2',3'-dideoxyinosine	K.I. Ozoemena, R.I. Stefan-van Staden and T. Nyokong	0.264
145	Instrum.Sci.Technol., 37(2), 189–196, 2009 https://doi.org/10.1080/10739140902735472	Enantioselective determination of R-clenbuterol using an enantioselective, potentiometricmembrane electrode based on a β-cyclodextrin derivative	R.I. Stefan-van Staden, L. Holo, B Moeketsi, J.F. van Staden, and H.Y. Aboul-Enein	0.1026
146	Instrum.Sci.Technol., 37(2), 197–203, 2009 https://doi.org/10.1080/10739140902735548	Determination of S(+)-ibuprofen using enantioselective, potentiometric membrane electrodes based on macrocylic antibiotics	R.I. Stefan-van Staden, T. Mashile, K.C. Mathabathe and J.F. van Staden	0.12825
147	Anal.Lett., 42(8), 1111-1118, 2009 https://doi.org/10.1080/00032710902890462	Enantioanalysis of butaclamol using enantioselective, potentiometric electrodes	R.I. Stefan-van Staden, R.G. Bokretsion, J.F. van Staden, H.Y. Aboul-Enein	0.12875
148	The Open Chem Biomed Meth J , 2, 107-110, 2009	Maltodextrins as chiral selectors in biomedical enantioanalysis. A minireview.	R.I. Stefan-van Staden, J.F. van Staden, H.Y. Aboul-Enein, M.C. Mirica, M. Iorga, I. Balcu	-
149	J.Solid State Electrochem., 14(6), 997-1000, 2010 https://doi.org/10.1007/s10008-009-0901-7	Diamond paste based electrodes for the determination of sildenafil citrate (viagra)	R.I. Stefan-van Staden, J.F. van Staden and H.Y. Aboul-Enein	-
150	Combinatorial Chemistry & High Throughput Screening, 13, 497-501, 2010. https://doi.org/10.2174/138620710791516094	Simultaneous determination of L- and D-T_4 using a sequential injection analysis/sensors system	R.I. Stefan-van Staden, J.F. van Staden, H.Y. Aboul-Enein, I. Balcu	0.149

151	Anal.Lett., 43(7), 1119-1125, 2010 https://doi.org/10.1080/00032710903518559	Determination of free L-T_4 and free L-T_3 from blood using theimmunsensors/sequential injection analysis system	R.I. Stefan, J.F. van Staden, H.Y. Aboul-Enein, I. Balcu, M.C. Mirica, G.L. Radu	0.0858
152	Combinatorial Chemistry & High Throughput Screening, 13, 690-693, 2010. https://doi.org/10.2174/138620710791920301	Enantioanalysis of (-)butaclamol using vancomycin and teicoplanin as chiral selectors	R.I. Stefan-van Staden, N.S. Nhlapo, J.F. van Staden, H.Y. Aboul-Enein	0.149
153	Anal.Lett., 43(7), 1111-1118, 2010 https://doi.org/10.1080/00032710903518534	Micro- and nanosensors. Recent developments and features. A minireview.	R.I. Stefan-van Staden, J.F. van Staden, S.C. Balasoiu, O.R. Vasile	0.12875
154 Q1	Talanta, 80(5), 1598-1605, 2010 https://doi.org/10.1016/j.talanta.2009.10.016	Application of porphyrins in flow-injection analysis. A Review.	J.F. van Staden, R.I. Stefan-van Staden	0.8535
155	Electrochim.Acta, 55(5), 1772-1777, 2010 https://doi.org/10.1016/j.electacta.2009.10.066	Enantioanalysis of S-deprenyl based on its interaction with C_{60} fullerene derivatives	R.I. Stefan-van Staden	1.607
156	Analytical Methods, 2(1), 37-40, 2010 https://doi.org/10.1039/B9AY00086K	Enantioanalysis of S-Ibuprofen using [5-6] Fullerene-C_{70} and diethyl (1,2- methanofullerene C_{70})-71-71-dicarboxylate	R.I. Stefan-van Staden	0.515
157 Q1	Talanta, 81(3), 865-870, 2010 https://doi.org/10.1016/j.talanta.2010.01.030	Enantioanalysis of R-deprenyl based on its molecular interaction with C_{70} fullerenes	R.I. Stefan-van Staden	1.707
158	New J Chem, 34(6), 1141-1147, 2010	Enantioanalysis of D-histidine based on its interaction with [5-6] fullerene-C_{70} and diethyl (1,2-	R.I. Stefan-van Staden	0.976

	https://doi.org/10.1039/B9NJ00583H	methanofullerene C_{70})-71-71-dicarboxylate		
159 Q1	Crit.Rev.Anal.Chem., 40(4), 226-233, 2010 https://doi.org/10.1080/10408347.2010.515450	Wireless electrochemical sensors. A tool for process control. The past, present and the future. A mini-review.	J.F. van Staden, R.I. Stefan-van Staden, S.C. Balasoiu	0.544
160	Anal.Meth., 2(6), 650-652, 2010. https://doi.org/10.1039/C0AY00118J	Diamond paste based electrodes for the determination of Ag(I)	R.I. Stefan-van Staden, S.G. Bairu and J.F. van Staden	0.3606
161	The Open Chem Biomed Meth J , 3, 86-89, 2010	Enantioselective, potentiometric membrane electrodes based on α-, β- and γ-cyclodextrins as chiral selectors for the assay of S-deprenyl.	RI Stefan-van Staden, T.R. Mashile, J.F. van Staden, H.Y. Aboul-Enein	-
162 Q1	Anal.Chim.Acta, 668(2), 201-206, 2010 https://doi.org/10.1016/j.aca.2010.04.025	Carbon and diamond paste microelectrodes based on Mn(III) porphyrins for the determination of dopamine	S.C. Balasoiu, R.I. Stefan-van Staden, J.F. van Staden, G.L. Radu, S. Pruneanu	0.4022
163	Anal.Lett., 44(6), 968-975, 2011 https://doi.org/10.1080/00032719.2010.506935	Enantioanalysis of L-histidine using enantioselective, potentiometric membrane electrodes based on maltodextrins	R.I. Stefan-van Staden, L. Holo	0.2575
164	Anal.Lett., 44(13), 2280-2286, 2011. https://doi.org/10.1080/00032719.2010.551688	Disposable stochastic dot sensors fplor the assay of ascorbic acid in pharmaceutical samples, beverages and biological fluids	RI Stefan-van Staden, J.F. van Staden, CS Balasoiu	0.1716
165	Current Pharm.Anal., 7(4), 253-257, 2011 https://doi.org/10.2174/157341211797458069	Enantioselective, potentiometric membrane electrodes based on maltodextrins and their applications for the determination of L-vesamicol in serum samples	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden, H.Y. Aboul-Enein	0.03
166	Current Pharm.Anal., 7(4), 258-261, 2011 https://doi.org/10.2174/157341211797457998	Cyclodextrins based enantioselective, potentiometric membrane electrodes and their applications for enantioanalysis of L-cysteine in urine	R.I. Stefan-van Staden, L. Holo, J.F. van Staden	0.04

167	International Journal of Electrochemistry, Volume 2011, Article ID427238, 4pg, https://doi.org/10.4061/2011/427238	Enantioselective, potentiometric membrane electrodes based on antibiotics for the determination of L- and D-glyceric acids	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	-
168	Electrochimica Acta, 58(31), 290-295, 2011 https://doi.org/10.1016/j.electacta.2011.09.040	Amperometric dot-sensors based on zinc porphyrins for sildenafil citrate determination	S.C. Balasoiu, R.I. Stefan-van Staden, J.F. van Staden, R.M. Ion, G.L. Radu, H. Y. Aboul-Enein	0.26783
169 Q1	Analyst, 137(4), 903-909, 2012. https://doi.org/10.1039/C2AN15892B	Determination of L- and D-fucose using amperometric electrodes based on diamond paste	R.I. Stefan-van Staden and R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.38475
170	Anal.Meth., 4(6), 1492-1497, 2012/With front cover. Published in a theme issue: Pharmaceutical Analysis. https://doi.org/10.1039/C2AY05515E	Enantioanalysis of ketoprofen based on its interaction with C_{60} fullerene and its derivatives	R.I. Stefan-van Staden, R.G. Bokretsion	0.541
171 Q1	Biosens & Bioelectron, 35(1), 439-442, 2012 https://doi.org/10.1016/j.bios.2012.02.036	Amperometric biosensor based on diamond paste for the enantioanalysis of L-lysine	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden and H.Y. Aboul-Enein	0.8805
172	J.Porphyrins Phthalocyanines, 16(7-8), 809-816, 2012 https://doi.org/10.1142/S1088424612500794	Microelectrodes based on porphyrins for the determination of ascorbic acid in pharmaceutical samples and beverages	R.I. Stefan-van Staden, S.C. Balasoiu, J.F. van Staden, G.L. Radu	0.1145
173	Current Pharm.Anal., 8(4), 334-338, 2012 https://doi.org/10.2174/1573412128033415 91	A novel ciprofloxacin selective membrane electrode	R.M. Nejem, M.M. Issa, R.I. Stefan-van Staden, H. Baroud	0.03

174 Q1	Talanta, 102, 34-43, 2012 https://doi.org/10.1016/j.talanta.2012.05.017	Flow-injection analysis systems with different detection devices and other related techniques for the in vitro and in vivo determination of dopamine as neurotransmitter. A review.	J.F. van Staden, R.I. Stefan-van Staden	0.8535
175 Q1	Journal of Electrochemical Society, 159(9), B789-B793, 2012 https://doi.org/10.1149/2.001209jes	Electroanalysis of oseltamivir phosphate using new microelectrodes based on zinc complexes with porphyrins and phthalocyanines	S.Pop, R.I. Stefan-van Staden, J.F. van Staden, H.Y. Aboul-Enein, R.M. Ion, Z. Aydoğmuş	0.304
176 Q1	Journal of Electrochemical Society, 159(12), B839-B844, 2012 https://doi.org/10.1149/2.058212jes	Stochastic dot microsensors for the assay of dopamine in pharmaceutical samples and biological fluids	R.I. Stefan-van Staden, S.C. Balasoiu, J.F. van Staden	0.608
177	Electrophoresis, 34(1), 178-204, 2013 https://doi.org/10.1002/elps.201200239	Chiral Selectors in Capillary Electrophoresis – Recent Developments and Applications	D.A. Tsioupi, R.I. Stefan-van Staden, C.P. Kapnissi-Christodoulou	0.3173
178	Chirality, 25(2), 114-118, 2013 https://doi.org/10.1002/chir.22119	Enantioanalysis of pipecolic acid with stochastic and potentiometric microsensors	R.I. Stefan-van Staden, I. Moldoveanu, D.F. Sava, C. Kapnissi-Christodoulou, J.F. van Staden	0.2328
179	Chirality, 25(9), 556-560, 2013 https://doi.org/10.1002/chir.22170	Chiral separation of the clinically important compounds fucose and pipecolic acid using CE – determination of the most effective chiral selector	C.A. Hadjistasi, I.J. Stavrou, R.I. Stefan-van Staden, H.Y. Aboul-Enein, C.P. Kapnissi-Christodoulou	0.2328
180	Rev Roum Chim, 58(7-8), 659-665, 2013	Enantioselective, potentiometric membrane electrodes based on cyclodextrines for the assay of glyceric acid in urine samples	R.I. Stefan-van Staden, R.M. Nejem, J.F. van Staden	-
181	Rev Roum Chim, 58(7-8), 667-671, 2013	Vancomycin and teicoplanin based enantioselective, potentiometric membrane	R.I. Stefan-van Staden, L. Holo	-

		electrodes for the assay of L-cysteine		
182 Q1	J Electrochem Soc, 160(10), B192-B195, 2013 https://doi.org/10.1149/2.028310jes	Inulins as new electroactive materials for enantioanalysis of chiral drugs	R.I. Stefan-van Staden, S.C. Balasoiu, G. Bazylak, J.F. van Staden, H.Y. Aboul-Enein, G.L. Radu	0.304
183 Q1	J Electrochem Soc., 160(10), B196-B200, 2013 https://doi.org/10.1149/2.029310jes	Quinine, quinidine and their tert-butyl carbomylated derivatives as new chiral selectors in the potentiometric, enantioselective membrane electrodes design. Their application for the assay of S and R enantiomers of dinitrobenzene leucine	R.I. Stefan-van Staden, J.F. van Staden	0.912
184	International J. Spectroscopy, Volume 2013, Article ID 726820, 8 pages, https://dx.doi.org/10.1155/2013/726820	Resolution of ternary mixture of aspirin, atorvastatin and clopidogrel by chemometric-assisted UV spectroscopic and liquid chromatography methods	M. Issa, R.M. Nejem, A.M. Abu Shanab, R.I. Stefan-van Staden	-
185	J. Mod.Med.Chem., 1(2), 86-91, 2013	New tool for screening of whole blood for early detection of breast cancer antigen (CA153)	R.I. Stefan-van Staden, J.F. van Staden	-
186 Q1	J Electrochem Soc, 161(2), B3001-B3005, 2014 https://doi.org/10.1149/2.026312jes	Stochastic sensors based on nanostructured materials used in the screening of whole blood for hepatitis B	R.I. Stefan-van Staden, I. Moldoveanu	0.912
187 Q1	J Electrochem Soc., 161(2), B3014-B3022, 2014 https://doi.org/10.1149/2.002402jes	Graphene based dot microsensors for the assay of adenine, guanine and epinephrine	J.F. van Staden, R. Georgescu, R.I. Stefan-van Staden, I. Calinescu	0.456
188	Current Pharmaceutical Analysis, 10(1), 20-29, 2014	Influence of the physical immobilization of dsDNA on the carbon based matrices of electrochemical sensors	LA Gugoasa, RI Stefan-van Staden, AA Ciucu, JF van Staden	0.03

	https://doi.org/10.2174/1573412910011401021047 40			
189	J Periodontal Research, 49(6), 711-718, 2014 https://doi.org/10.1111/jre.12153	Oral keratinocyte stem cells expansion but not differentiation on specific substrates	B. Calenic, I. Alexandru Paun, R.I. van Staden, M. Dinescu, A. Petre, A. Moldovan, M. Greabu	0.17428
190	Chirality, 26(3), 129-131, 2014 https://doi.org/10.1002/chir.22281	Enantioselective Surface Plasmon Resonance Sensor Based on C_{60} Fullerene-Glutathione Self-Assembled Monolayer (SAM)	R.I. Stefan-van Staden	1.164
191 Q1	J Electrochem Soc, 161(4), B45-B48, 2014 https://doi.org/10.1149/2.021404jes	Multimode sensors based on nanostructured materials for simultaneous screening of biological fluids for specific breast cancer and hepatitis B biomarkers	R.I. Stefan-van Staden, I. Moldoveanu	0.912
192 Q1	J Electrochem Soc, 161(4), B49-B54, 2014 https://doi.org/10.1149/2.034404jes	Evaluation of amperometric dot microsensors for the analysis of serotonin in urine samples	J.F. van Staden, R. Georgescu, R.I. Stefan-van Staden, I. Calinescu	0.456
193	Spectrochim. Acta Part A: Molecular and Biomolecular Spectroscopy, 128, 514-521, 2014 https://doi.org/10.1016/j.saa.2014.02.002	Comparative study of three modified numerical spectrophotometric methods: An application on pharmaceutical ternary mixture of aspirin, atorvastatin and clopedogrel	R.M. Nejem, M.M. Issa, R.I. Stefan-van Staden	0.4086
194	J Neurosci Meth, 229, 1-7, 2014 https://doi.org/10.1016/j.jneumeth.2014.03.008	Pattern recognition of neurotransmitters using multimode sensing	R.I. Stefan-van Staden, I. Moldoveanu, J.F. van Staden	0.464
195	Scientia Pharmaceutica, 82, 601-615, 2014	Difference between adjacent data point as a new method for the analysis of ternary mixtures of	M.M. Issa, R.M. Nejem, A.M. Abu Shanab, R.I. Stefan-van Staden	-

		tartrazine, Sunset Yellow and Azorubine dyes		
196	Journal of Membrane and Separation Technology, 3(2), 86-90, 2014	Enantioanalysis of L-cysteine using enantioselective, potentiometric membrane electrodes	R.I. Stefan-van Staden, L. Holo	-
197	J Molec Recogn, 27(11), 653-658, 2014 https://doi.org/10.1002/jmr.2388	Molecular screening of HER-1 in whole blood samples	I. Moldoveanu, C. Stanciu-Gavan, R.I. Stefan-van Staden	0.199
198 Q1	J. Electrochem.Soc., 161(9), B167-B170, 2014 https://doi.org/10.1149/2.011409jes	A genetic screening test for obesity based on stochastic sensing	R.I. Stefan-van Staden, L.A. Gugoasa, J.F. van Staden, O.C. Rusu	0.456
199	Sensing and Biosensing Research, 1, 1-7, 2014 https://doi.org/10.1016/j.sbsr.2014.05.001	Challenges in enantioanalysis of fucose using stochastic and potentiometric microsensors	Moldoveanu, R.I. Stefan-van Staden, C.P. Kapnissi-Christodoulou, J.F. van Staden, H.Y. Aboul-Enein	-
200	RSC Advances, 4(50), 26383-26388, 2014 https://doi.org/10.1039/C4RA03804E	Screening tools for neuron specific enolase	R.I. Stefan-van Staden, I.R. Comnea, J.F. van Staden, C. Stanciu Gavan	0.31225
201	Analytical Chemistry Research, 1, 1-7, 2014 https://doi.org/10.1016/j.ancr.2014.06.001	Screening of children saliva samples for bisphenol A using stochastic, amperometric and multimode microsensors	R.I. Stefan-van Staden, L.A. Gugoasa, B. Calenic, J.F. van Staden, J Legler	-
202	Scientific Reports 4, 5579, 2014 https://doi.org/10.1038/srep05579	Pattern recognition of estradiol, testosterone and dihydrotestosterone in children' s saliva samples using stochastic microsensors	R.I. Stefan-van Staden, L.A. Gugoasa, B. Calenic, J. Legler	0.459
203	Buletinul Societatii de Chimie, XIX(2), 22-28, 2014	Monocrystalline Diamond Paste Based Sensors and Microsensors	R.I. Stefan-van Staden	-

204	RSC Advances, 4(97), 54140 - 54143, 2014 https://doi.org/10.1039/C4RA08987A	Engineered Nanoporous Gold Microspheres for Stochastic Sensing	R.I. Stefan-van Staden, I. Moldoveanu, C. Surdu-Bob, C Stanciu-Gavan	0.31225
205 Q1	Crit.Rev.Anal.Chem., 45(1), 2-31, 2015 https://doi.org/10.1080/10408347.2013.866035	Immunosensors in clinical and environmental analysis	R.I. Stefan-van Staden, R.G. Bokretsion, J.F. van Staden H.Y. Aboul-Enein	0.408
206	Electrochem.Comm., 51, 98-102, 2015 https://doi.org/10.1016/j.elecom.2014.12.010	New Stochastic Microsensors Based on Oleamides	C. Cioates Negut, R.I. Stefan–van Staden, I. Moldoveanu, E.M. Ungureanu, C. Stanciu-Gavan	0.2844
207	J Molec Recogn, 28(1), 10-19, 2015 https://doi.org/10.1002/jmr.2408	Multimode sensors as new tools for molecular recognition of testosterone, dihydrotestosterone and estradiol in children's saliva	L.A. Gugoasa, R.I. Stefan-van Staden, B. Calenic, J. Legler	0.14925
208	Journal of Enzyme Inhibition and Medicinal Chemistry, 30(2), 283-285, 2015 https://doi.org/10.3109/14756366.2014.915397	Pattern recognition of HER-1 in biological fluids using stochastic sensing	R.I. Stefan-van Staden, I. Moldoveanu, C. Stanciu-Gavan	0.3943
209	J Molec Recogn, 28(2), 103-107, 2015 https://doi.org/10.1002/jmr.2433	Pattern recognition of neuron specific enolase and carcinoembryonic antigen in whole blood samples	R.I. Stefan-van Staden, I.R. Comnea, C.C. Surdu-Bob, C. Stanciu-Gavan	0.14925
210	Rev Roum Chim, 60(5-6), 447-451, 2015	Platform based on microsensors used for the screening of HER-1 in peritoneal fluid	I. Moldoveanu, R.I. Stefan-van Staden, J.F. van Staden, C. Stanciu-Gavan, C. Savlovschi	-
211	Current Drug Therapy, 9, 250-255, 2015	Design of potentiometric sensors based on Interaction of cyclodextrins with the enantiomer of interest.	R.I. Stefan-van Staden, R.G. Bokretsion, J.F. van Staden, H.Y. Aboul-Enein	0.02

212	Rev Roum Chim, 60(5-6), 461-466, 2015	Detection of folic acid from orange juice using amperometric dot microsensors based on graphite and graphene	R. Georgescu, J.F. van Staden, R.I. Stefan-van Staden, C. Boscornea	-
213	J Porph Phthal, 19(5), 679-687, 2015 https://doi.org/10.1142/S1088424615500066	Evaluation of Amperometric Dot Microsensors for the Analysis of Folic Acid in Pharmaceutical Tablets and Urine Samples	R. Georgescu, J.F. van Staden, R.I. Stefan-van Staden, C. Boscornea	0.1145
214	Medical Hypothesis, 84(3), 252-257, 2015 https://doi.org/10.1016/j.mehy.2015.01.006	A new hypothesis of aging	AG Diaconeasa, M Rachita, R.I. Stefan-van Staden	0.224
215	Spectrochim Acta Part A, 142, 204-209, 2015 https://doi.org/10.1016/j.saa.2015.01.064	New approach application of data transformation in mean centering of ratio spectra method	M.M. Issa, R.M. Nejem, RI Stefan-van Staden, H.Y. Aboul-Enein	0.3065
216	Electroanalysis 27(8), 1842-1846, 2015 https://doi.org/10.1002/elan.201500081	Chitosan based diamond paste stochastic sensors modified with gold nanoparticles detect hepatitis C core antigen	I. Moldoveanu, R.I. Stefan-van Staden, J.F. van Staden	0.264
217 Q1	J Electrochem Soc, 162(7), H477-H480, 2015 https://doi.org/10.1149/2.0671507jes	Enantioselective, potentiometric membrane electrodes based on C70 fullerenes for the enantioanalysis of S-Clenbuterol in serum	R.I. Stefan-van Staden	1.824
218	RSC Advances, 5(56), 45545-45550, 2015 https://doi.org/10.1039/C5RA04777C	Novel Textile Material Based Disposable Sensors for Biomedical Analysis	R.I. Stefan-van Staden, L.A. Gugoasa, M. Badulescu, C. Surdu-Bob	0.31225
219	RSC Advances, 5(70), 57164-57170, 2015 https://doi.org/10.1039/C5RA06030C	Development and validation of kinetic and atomic absorption spectrophotometric methods for the determination of salbutamol sulfate	R.M. Nejem, M.M. Issa, A.A. Saleh, A.A. Shanab, R.I. Stefan van Staden, H.Y. Aboul-Enein	0.20816

220 Q1	J.Electrochem.Soc., 162(9), B245-B247, 2015 https://doi.org/10.1149/2.0931509jes	A new graphene stochastic sensor for the molecular screening of TNF-α	IR Comnea-Stancu, RI Stefan-van Staden, AR Biris	0.608
221 Q1	Nanoscale, 7(36), 14848-14853, 2015 (cu coperta) https://doi.org/10.1039/C5NR03064A	Pattern recognition of monocyte chemoattractant protein-1 (MCP-1) in whole blood samples using new platforms based on nanostructured materials.	R.I. Stefan-van Staden, L.A. Gugoasa, C. Socaci, A.R. Biris	0.690
222	ECS J Solid State Sci Technol, 4(10), S3006-S3010, 2015 https://doi.org/10.1149/2.0021510jss	Multimode microsensors based on carbon matrices used for the assay of IL-6 in whole blood samples	L.A. Gugoasa, R.I. Stefan-van Staden	0.3395
223	ESC J Solide State Science & Technol., 4(10), S3067-S3070, 2015 https://doi.org/10.1149/2.0181510jss	Pattern recognition of HER-2 in whole blood samples using stochastic microsensors	I. Moldoveanu, R.I. Stefan-van Staden	0.3395
224	RSC Advances, 5(81), 66185-66191, 2015 https://doi.org/10.1039/C5RA13054A	New nanocomposites-graphene pastes based stochastic microsensors	R.I. Stefan-van Staden, L.A. Gugoasa, C.A. Socaci, A.R. Biris	0.31225
225	Microelectronic Engineering, 148, 64-69, 2015 https://doi.org/10.1016/j.mee.2015.08.007	Fast screening of biological fluids for cytokines and adipokines using stochastic sensing	L.A. Gugoasa, R.I. Stefan-van Staden, A. Dima, C.A. Visan, A. Streinu-Cercel, C. Socaci, A.R. Biris, B. Calenic	0.113
226 Q1	Nanoscale, 7(38), 15689-15694, 2015 https://doi.org/10.1039/C5NR04476F	Nanostructured materials detect epidermal growth factor receptor, neuron specific enolase and carcinoembryonic antigen	RI Stefan-van Staden, I.R. Comnea-Stancu, C.C. Surdu-Bob, M Badulescu	0.690
227	Chirality, 27(12), 973-978, 2015	Fast screening test of whole blood samples and pharmaceutical	G Mitrofan, RI Stefan-van Staden, IR Comnea-	0.16628

	https://doi.org/10.1002/chir.22537	compounds for enantiorecognition of free L-T3, L-T4, and D-T4	Stancu, JF van Staden, G Bazylak, C Kapnissi-Christodoulou, HY Aboul-Enein	
228	RSC Adv, 5(92), 75451-75457, 2015 https://doi.org/10.1039/C5RA14635F	Ionic Liquids for the Molecular Enantiorecognition of free L-T3, L-T4 and D-T4	RI Stefan-van Staden, G Mitrofan, IR Comnea-Stancu, JF van Staden, C Kapnissi-Christodoulou, HY Aboul-Enein	0.20816
229 Q1	J Electrochem Soc, 162(14), B360-B362, 2015 https://doi.org/10.1149/2.0831514jes	Carbon modified paper based disposable sensors	R.I. Stefan-van Staden, I. Moldoveanu, C. Surdu-Bob, M. Badulescu, J.F. van Staden	0.3648
230 Q1	J Electrochem Soc, 162(14), B351-B353, 2015 https://doi.org/10.1149/2.0741514jes	Diamond Paste-Based Stochastic Sensor for Screening of Children's Cerebrospinal Fluid	R.I. Stefan-van Staden, I.R. Comnea-Stancu, C.A. Visan, A. Streinu-Cercel	0.456
231	Anal.Lett., 49(3), 335-341, 2016 https://doi.org/10.1080/00032719.2014.978502	New platforms for fast assessment of levels of testosterone, dihydrotestosterone and estradiol in children's saliva	L.A. Gugoasa, R.I. Stefan-van Staden, J.F. van Staden, B. Calenic, J.F. van Staden, J. Legler	0.0858
232	Microsystem Technologies, 22(1), 11-16, 2016 https://doi.org/10.1007/s00542-015-2628-y	Pattern recognition of adipokines in whole blood samples using stochastic sensing	L.A. Gugoasa, R.I. Stefan-van Staden, O.C. Rusu	0.199
233	Microsystem Technologies, 22(1), 25-29, 2016 https://doi.org/10.1007/s00542-015-2635-z	Stochastic sensors based on maltodextrins for screening of whole blood for neuron specific enolase, carcinoembryonic antigen and epidermal growth factor receptor	I.R. Comnea-Stancu, R.I. Stefan-van Staden, J.F. van Staden, C. Stanciu-Gavan	0.14925
234 Q1	J Electrochem Soc, 163(6), B252-B255, 2016	New stochastic sensors for the assay of biogenic amines in wines	F. Harja, R.I. Stefan–van Staden, I.R. Comnea-	0.3648

	https://doi.org/10.1149/2.1141606jes		Stancu, C. Cioates Negutc, E.M. Ungureanu	
235	J Pharm Biomed Anal, 128, 280-285, 2016 https://doi.org/10.1016/j.jpba.2016.05.040	Stochastic sensors designed for assessment of biomarkers specific to obesity	C Cioates Negut, RI Stefan-van Staden, EM Ungureanu, DI Udeanu	0.27075
236 Q1	J Electrochem Soc, 163(10), B563-566, 2016 https://doi.org/10.1149/2.1001610jes	New Azulene Based Stochastic Microsensor	GL Arnold, RI Stefan-van Staden, I Moldoveanu-Ionita, EM Ungureanu, LR Popescu-Mandoc	0.3648
237	J Pharm Biomed Anal, 135, 16-19, 2017 https://doi.org/10.1016/j.jpba.2016.12.009	Fast Screening of Tissue Samples for Glycogen	RI Stefan-van Staden, AG Diaconeasa, C Stanciu Gavan	0.361
238	Current Pharmaceutical Analysis, 13(2), 154-161, 2017 https://doi.org/10.2174/1573412913666161107153037	Difference between Adjacent Data Point as a New Method for the Analysis of Ternary Mixtures of Tartrazine, Sunset Yellow and Azorubine Dyes	R.M. Nejem, M.M. Issa, A.M. Abu Shanab, R.I. Stefan-van Staden, H.Y. Aboul-Enein	0.024
239	Microsystem Technology, 23,1141–1145, 2017 https://doi.org/10.1007/s00542-016-3039-4	Pattern recognition of Cu(II), Pb(II), Hg(II), and Cd(II) in waste waters	LR Mandoc (Popescu), I Moldoveanu, RI Stefan-van Staden, EM Ungureanu	0.14925
240 Q1	J Electrochem Soc,, 164(6), B267-B273, 2017 https://doi.org/10.1149/2.1621706jes	Molecular screening of blood samples for the simultaneous detection of CEA, HER-1, NSE, CYFRA 21-1 using stochastic sensors	RI Stefan-van Staden, IR Comnea-Stancu, CC Surdu-Bob	0.608
241	RSC Advances, 7, 28419 - 28426, 2017 https://doi.org/10.1039/C7RA03842A	Multimode microsensors based on Ag-TiO2-graphene materials used for the molecular recognition of carcinoembryonic antigen in whole blood samples	LA Gugoasa, AJM Al`Ogaidi, RI Stefan-van Staden, A El-Khatib, MC Rosu, S Pruneanu	0.208

242 Q1	J Electrochem Soc, 164(9), B443-B447, 2017 https://doi.org/10.1149/2.1191709jes	Molecular recognition of colon cancer biomarkers: P53, KRAS and CEA in whole blood samples	LA Gugoasa, RI Stefan-van Staden, AJM Al`Ogaidi, C Stanciu-Gavan	0.456
243	Anal Bioanal Chem, 409(26), 6195-6203, 2017 https://doi.org/10.1007/s00216-017-0560-y	Phthalocyanine-BODIPY dye: synthesis, characterization, and utilization for pattern recognition of CYFRA 21-1 in whole blood samples	R.I. Stefan-van Staden, I.R. Comnea-Stancu, H. Yanık, M. Göksel, A. Alexandru, M. Durmuş	0.2393
244 Q1	J Electrochem Soc., 164(12), B502-B505, 2017 https://doi.org/10.1149/2.0661712jes	Determination of p53 using graphite based amperometric sensors	R.I. Stefan-van Staden, A.J.M. AL-Ogaidi, L.A. Gugoasa	0.608
245	RSC Adv., 7, 43567-43573, 2017 https://doi.org/10.1039/C7RA08724A	Fast screening of whole blood samples for early detection and monitoring of thyroid diseases	RI Stefan-van Staden, G Mitrofan	0.6245
246 Q1	J Electrochem Soc, 164(12), B561-B566, 2017 https://doi.org/10.1149/2.1961712jes	New nanostructured materials detect dopamine in biological fluids	RI Stefan-van Staden, LR Balahura, A Oprisanu-Vulpe, LA Gugoasa, JF van Staden, EM Ungureanu, C Socaci	0.2605
247 Q1	Sens Actuators B, 256, 665-673, 2018 https://doi.org/10.1016/j.snb.2017.09.205	Graphene-porphyrin composite synthesis through graphite exfoliation: the electrochemical sensing of catechol	M Coroş, F Pogăcean, L Măgeruşan, MC Roşu, AS Porav, C Socaci, A Bende, RI Stefan-van Staden, S Pruneanu	0.2358
248	Anal. Bioanal. Chem., 410(1), 115-121, 2018 https://doi.org/10.1007/s00216-017-0698-7	Pattern recognition of 8-hydroxy-2`-deoxyguanosine in biological fluids	RI Stefan-van Staden, LR Balahura, LA Gugoasa, JF van Staden, HY Aboul-Enein, MC Rosu, S Pruneanu	0.2051
249	Anal. Lett., 51(12), 1927-1934, 2018	Disposable stochastic sensors for the simultaneous assay of	RI Stefan-van Staden, AG Diaconeasa, CC Surdu-Bob	0.1716

	https://doi.org/10.1080/00032719.2017.1396335	acetylcholine and dopamine in whole blood samples		
250	Current Medicinal Chemistry, 25(33), 4036-4049, 2018 https://doi.org/10.2174/0929867326661707241026 02	Advanced methods for analysis of testosterone	L.A. Gugoasa, R.I. Stefan-van Staden	0.654
251	Nanotechnology, 29, 095501 (9pp) 2018 https://doi.org/10.1088/1361-6528/aaa316	Sensitive detection of hydroquinone using exfoliated graphene-Au/glassy carbon modified electrode	F Pogacean, M Coros, L Magerusan, M Rosu, C Socaci, S Gergely, RI Stefan van Staden, M Moldovan, C Sarosi, S Pruneanu	0.117
252	EC Pulmonology and Respiratory Medicine, 7(3), 80-81, 2018 https://ecronicon.net/assets/ecprm/pdf/ECPRM-07-00171.pdf	Early detection of lung cancer using stochastic sensors– a screening test for life	RI Stefan-van Staden	-
253	Chirality, 30(5), 680-685, 2018 https://doi.org/10.1002/chir.22843	Molecular enantiorecognition of L- and D-glucose in whole blood samples	RI Stefan-van Staden, G Mitrofan	0.582
254	Anal Lett, 51(17), 2820-2832, 2018 https://doi.org/10.1080/00032719.2018.1453516	Electrochemical determination of the KRAS genetic marker for colon cancer with modified graphete and graphene paste electrodes	AJ M AL-Ogaidi, LA Gugoasa, RI Stefan-van Staden, MC Rosu, C Socaci	0.103
255 Q1	J Electrochem Soc, 165(8), B3054-B3059, 2018 https://doi.org/10.1149/2.0101808jes	Graphene/TiO2-Ag based composites used as sensitive electrode materials for amaranth electrochemical detection and degradation	MC Rosu, F Pogacean, M Coros, L Magerusan, M Moldovan, C Sarosi, RI Stefan-van Staden, S Pruneanu	0.228

256	Annals of Anatomy - Anatomischer Anzeiger, 219, 89-93, 2018 https://doi.org/10.1016/j.aanat.2018.02.012	Salivary biomarkers of inflammation in systemic lupus erythematosus	II Stanescu, B Calenic, A Dima, LA Gugoasa, E Balanescu, RI Stefan van Staden, C Baicus, DG Badita, M Greabu	0.1187
257 Q1	Anal Chem, 90(16), 9997-10000, 2018 https://doi.org/10.1021/acs.analchem.8b02467	Molecular recognition of nitrites and nitrates in water samples using graphene-based stochastic microsensors	RI Stefan-van Staden, M Mincu, JF van Staden, LA Gugoasa	0.70125
258	Electroanalysis, 30(11), 2628-2634, 2018 https://doi.org/10.1002/elan.201800523	Pattern recognition of diabetes related biomarkers	RI Stefan-van Staden, G Mitrofan, C Ionescu-Targoviste	0.264
259	Anal Bioanal Chem, 410(29), 7723–7737, 2018 https://doi.org/10.1007/s00216-018-1386-y	Molecular Recognition of IL-8, IL-10, IL-12, and IL-15 in Biological Fluids Using Phthalocyanine based Stochastic Sensors	RI Stefan-van Staden, RM Ilie, LA Gugoasa, A Bilasco, CA Visan, A Streinu-Cercel	0.23933
260 Q1	J Electrochem Soc, 165(14), B659-B664, 2018 https://doi.org/10.1149/2.0361814jes	Molecular recognition of pyruvic acid and L-lactate in early-diabetic stage	RI Stefan-van Staden, I Popa-Tudor, C Ionescu-Tirgoviste, RA Stoica	0.456
Papers published between 2019 and 2024				
261 Q1	Talanta, 196, 182-190, 2019 https://doi.org/10.1016/j.talanta.2018.12.051	Exfoliation of graphite rods via pulses of current for graphene synthesis: sensitive detection of 8-hydroxy-2'-deoxyguanosine	F Pogacean, M Coros, L Magerusan, V Mirel, A Turza, G Katona, RI Stefan-van Staden, S Pruneanu	0.213
262	PLOS ONE, 14(1): e0210288. https://doi.org/10.1371/journal.pone.0210288, 2019	The salivary levels of leptin and interleukin-6 as potential inflammatory markers in children obesity	C. Pîrsean, C. Neguț, R.I. Stefan-van Staden, C.E. Dinu-Pirvu, P. Armean, D. I. Udeanu	0.2558
263	J Immunoassay Immunochem., 40(1), 40-51, 2019	Advances in immunosensors for clinical applications	LR Balahura, RI Stefan-van Staden, JF van Staden, HY Aboul-Enein	-

	https://doi.org/10.1080/15321819.2018.1543704			
264	Anal Lett, 52(5), 803-812, 2019 https://doi.org/10.1080/00032719.2018.1496444	Determination of cadmium(II), copper(II), mercury(II), and lead(II) in water using stochastic sensors based on graphite and diamond paste modified with 1H-pyrrole-1-hexanoic acid	RI Stefan-van Staden, JF van Staden, LA Gugoasa, LR Popescu-Mandoc	0.1287
265 Q1	J Electrochem Soc, 166 (4), B183-B186, 2019 https://doi.org/10.1149/2.0201904jes	Pattern recognition of p53 and KRAS in whole blood samples	RI Stefan-van Staden, RM Ilie, LA Gugoasa, C Stanciu-Gavan	0.456
266	Electroanalysis, 31(6), 1034-1039, 2019 https://doi.org/10.1002/elan.201900017	Molecular recognition of aflatoxin M1 in water and milk samples	M. Mincu, R.I. Stefan-van Staden, J.F. van Staden	0.264
267	New J Chem, 43(13), 5196-5201, 2019 https://doi.org/10.1039/C9NJ00588A	Pattern recognition of melatonin using stochastic sensors	RI Stefan-van Staden, A. Lungu - Moscalu, J.F. van Staden	0.3253
268	Microchem J, 147, 112-120, 2019 https://doi.org/10.1016/j.microc.2019.03.007	Graphene-based materials produced by graphite electrochemical exfoliation in acidic solutions: Application to Sunset Yellow voltammetric detection	F Pogacean, M Coros, L Magerusan, V Mirel, S Gergely, G Katona, RI Stefan-van Staden, S Pruneanu	0.15875
269 Q1	J Electrochem Soc, 166(9), B3051-B3055, 2019 https://doi.org/10.1149/2.0111909jes	Molecular Recognition of C-Reactive Protein, Adiponectin and Zn2+ in Serum Samples	RI Stefan-van Staden, I Popa-Tudor	0.912
270	Electroanalysis, 31(7), 1342-1347, 2019	Electroanalysis of Bisphenols A, F, and Z Using Graphene Based Stochastic Microsensors	RI Stefan-van Staden, M Mincu, JF van Staden	0.264

	https://doi.org/10.1002/elan.201900136			
271 Q1	J Electrochem Soc, 166(9), B3109-B3115, 2019 https://doi.org/10.1149/2.0211909jes	Molecular enantiorecognition of D- and L-glucose in urine and whole blood samples	R.I. Stefan-van Staden, I. Popa-Tudor, C. Ionescu-Tirgoviste, R.A. Stoica, L. Magerusan	0.3648
272 Q1	J Electrochem Soc, 166(12), B903-B907, 2019 https://doi.org/10.1149/2.0521912jes	Nanostructured Materials Used for Pattern Recognition of Bisphenols in Waste Waters	RI Stefan-van Staden, A. Lungu - Moscalu, J.F. van Staden	0.608
273	Anal Lett, 52 (16), 2583–2606, 2019 https://doi.org/10.1080/00032719.2019.1620262	Electrochemical determination of bisphenol A in saliva by a novel three-dimensional (3D) printed Gold-reduced graphene oxide (rGO) composite paste electrode	LA Gugoasa, RI Stefan-van Staden, JF van Staden, M Coros, S Pruneanu	0.103
274	Sensors, 19, 4297, 2019 https://doi.org/10.3390/s19194297	Detection of 8-hydroxy-20-deoxyguanosine biomarker with a screen-printed electrode modified with graphene	C Varodi, F Pogacean, M Coros, MC Rosu, RI Stefan-van Staden, E Gal, L Barbu Tudoran, S Pruneanu, S Mirel	0.146
275	Electrochem Comm, 109, 106581, 2019 https://doi.org/10.1016/j.elecom.2019.106581	Determination of β-carotene in soft drinks using a stochastic sensor based on a graphene-porphyrin composite	RI Stefan-van Staden, A Moscalu-Lungu, JF van Staden	0.474
276	Journal of Porphyrins and Phthalocyanines, 23(11-12), 1365-1370, 2019 https://doi.org/10.1142/S1088424619501293	Graphene based stochastic sensors for pattern recognition of gastric cancer biomarkers in biological fluids	RI Stefan-van Staden, RM Ilie-Mihai, F Pogacean, S Pruneanu	0.27075
277	Electroanalysis, 32(1), 178-184, 2020 https://doi.org/10.1002/elan.201900481	Pattern recognition of sweeteners in biological fluids, beverages, and ketchup using stochastic sensors	RI Stefan-van Staden, A Moscalu-Lungu, JF van Staden	0.264

278	Electroanalysis, 32(1), 7-10, 2020 https://doi.org/10.1002/elan.201900497	Pattern recognition of amino acids in wines	C. Cioates Negut, R.I. Stefan–van Staden, F. Harja, J.F. van Staden	0.198
279	Chirality, 32(2), 215-222, 2020 https://doi.org/10.1002/chir.23155	Enantioanalysis of tryptophan in whole blood samples using stochastic sensors – a screening test for gastric cancer	RM Ilie-Mihai, RI Stefan-van Staden, L Magerusan, M Coros, S Pruneanu	0.1584
280 Q1	J Electrochem Soc, 167(3), 037528, 2020 https://doi.org/10.1149/2.0282003JES	Recent progress in the graphene-based electrochemical sensors and biosensors. A review.	M Coros, S Pruneanu, RI Stefan-van Staden	0.608
281 Q1	Carbon, 158, 267-281, 2020 https://doi.org/10.1016/j.carbon.2019.12.011	Cytotoxicity mechanisms of nitrogen-doped graphene obtained by electrochemical exfoliation of graphite rods, on normal and tumor cells	I Baldea, D Olteanu, GA Filip, F Pogacean, M Coros, M Suciu, S C Tripon, M Cenariu, RI Stefan-van Staden, S Pruneanu	0.2613
282	J. Clin. Med., 9(1), 76, 2020 https://doi.org/10.3390/jcm9010076	A screening test for early diagnosis of microcellular bronchopulmonary cancer - Pilot study	CE Nistor, RI Stefan-van Staden, AV Dumitru, C Stanciu Gavan	0.3685
283	Electroanalysis, 32(5), 1060-1064, 2020 https://doi.org/10.1002/elan.201900688	Nanocarbon materials modified with a complex of protoporphyrin IX, recognized antibiotics in water samples	RI Stefan-van Staden, M Mincu	0.396
284	Anal Lett, 53(13), 2021-2033, 2020 https://doi.org/10.1080/00032719.2020.1728293	Stochastic microsensors for molecular recognition of IL-1β, IL-6, IL-12, and IL-17 in whole blood	RI Stefan-van Staden, I Popa-Tudor, C Ionescu-Targoviste, RA Stoica	0.12875
285	Anal Bioanal Chem, 412(13), 3199-3207, 2020	Enantioanalysis of glutamine - a key factor in establishing the metabolomics process in gastric cancer	RI Stefan-van Staden, RM Ilie-Mihai, L Magerusan, M Coros, S Pruneanu	0.2872

	https://doi.org/10.1007/s00216-020-02575-y			
286	Anal Lett., 53(16), 2545-2558, 2020 https://doi.org/10.1080/00032719.2020.1747480	Simultaneous determination of carcinoembryonic antigen (CEA), carbohydrate antigen 19-9 (CA19-9), and serum protein p53 in biological samples with protoporphyrin IX (PIX) used for recognition by stochastic microsensors	RI Stefan-van Staden, RM Ilie-Mihai, S Gurzu	0.1716
287	Anal Bioanal Chem, 412(17), 4135-4141, 2020 https://doi.org/10.1007/s00216-020-02646-0	Fast screening method for molecular recognition of islet amyloid polypeptide from whole blood samples collected from diabetic patients with disposable stochastic sensors obtained by nanolayer, and nanolayer by nanolayer deposition using cold plasma	RI Stefan-van Staden, I. Popa-Tudor, M. Badulescu, A. Anghel	0.359
288	Combinatorial Chemistry & High Throughput Screening, 23(10), 1080-1089, 2020 https://doi.org/10.2174/1386207323666200628111958	Rhodamine B – as New Chromophore for the Determination of Melatonin in Biological, Food, and Pharmaceutical Samples	A Lungu-Moscalu, C Cioates - Negut, RI Stefan-van Staden, AA Bunaciu, JF van Staden	0.1192
289	Anal Bioanal Chem, 412(21), 5191–5202, 2020 https://doi.org/10.1007/s00216-020-02663-z	Myoglobin-silver reduced graphene oxide nanocomposite stochastic biosensor for the determination of luteinizing hormone and follicle-stimulating hormone from saliva samples	LA Gugoasa Dinu, RI Stefan-van Staden, FJ van Staden, M. Coros, SM Pruneanu	0.2872
290	Sensors, 20(8), 2420, 2020 https://doi.org/10.3390/s20082420	Fast screening of whole blood and tumor tissue for bladder cancer biomarkers using stochastic needle sensors	RI Stefan-van Staden, DC Gheorghe, V. Jinga, M. Geanta	0.3285

291	ECS Journal of Solid State Science and Technology, 9, 041015, 2020 https://doi.org/10.1149/2162-8777/ab902e	Dot microsensors based on zinc porphyrins and zinc phthalocyanines for the determination of indigo carmine	R.I. Stefan-van Staden, J.F. van Staden	0.3395
292	Multidisciplinary Cancer Investigations, 4(3), 25-30, 2020	The fast screening method of biological samples for early diagnosis of gastric cancer	RI Stefan-van Staden, RM Ilie-Mihai, S Gurzu	-
293	World Journal of Gastrointestinal Oncology, 12(7), 741-755, 2020 https://doi.org/10.4251/wjgo.v12.i7.741	Maspin subcellular expression of wild-type- and mutant TP53 gastric cancers	S Gurzu, I Jung, H Sugimura, RI Stefan-van Staden, H Yamada, H Natsume, Y Iwashita, R Szodorai, J Szederjesi	0.0753
294	ECS Journal of Solid State Science and Technology, 9, 051005, 2020 https://doi.org/10.1149/2162-8777/ab9a5d	Porphyrins – as acyive materials in the design of sensors. An overview.	C Cioates-Negut, RI Stefan-van Staden, JF van Staden	0.2263
295	ECS Journal of Solid State Science and Technology, 9, 051012, 2020 https://doi.org/10.1149/2162-8777/ab9dc8	Enzymatic and nonenzymatic (bio)sensors based on phthalocyanines. A minireview.	C Stefanov, JF van Staden, RI Stefan-van Staden	0.2263
296	Analytical Biochemistry, 605, 113839, 2020 https://doi.org/10.1016/j.ab.2020.113839	Stochastic microsensors used for the assessment of DNA damage in leukemia	RI Stefan-van Staden, LR Balahura, C Cioates-Negut, HY Aboul-Enein	0.3165
297	Sensors, 20, 3609, 2020 https://doi.org/10.3390/s20123609	Stone paper as a new substrate to fabricate flexible screen-printed electrodes for the electrochemical detection of dopamine	C Varodi, F Pogăcean, M Gheorghe, V Mirel, M Coros, L Barbu Tudoran, RI Stefan-van Staden, SM Pruneanu	0.164

298	Nanomaterials, 10(8), 1528, 2020 https://doi.org/10.3390/nano10081528	Disposable Stochastic Sensors Based on Nanolayer Deposition(s) of Silver, and AgC Composite on Plastic for the Assay of α-Amylase in Whole Blood and Saliva	RI Stefan-van Staden, A. Moscalu-Lungu, M. Badulescu	0.519
299	New J Chem, 44(46), 20203-20211, 2020 https://doi.org/10.1039/D0NJ03847D	Needle stochastic sensors for on-site fast recognition and quantification of biomarkers for gastric cancer in biological samples	RI Stefan-van Staden, RM Ilie-Mihai, F Pogacean, SM Pruneanu	0.244
300	Journal of Oncology, Article ID 8860174, 10 pages, 2020 https://doi.org/10.1155/2020/8860174	Comparison study of HER-2 status in gastric carcinoma samples, using two commercial antibodies	CB Satala, I Jung, RI Stefan van Staden, Z Kovacs, C Molnar, T Bara, Z Fulop, S Gurzu	-
301	Chemosensors, 8(4), 112, 2020 https://doim.org/10.3390/chemosensors8040112	Sensing and interaction of His-tagged CA19-9 antigen with graphene-modified electrodes	M Mic, C Varodi, F Pogacean, C Socaci, M Coros, RI Stefan-van Staden, S Pruneanu	0.1635
302	Journal of Gastrointestinal & Digestive System, 10, 7, 2020	Validation of a screening test, based on simultaneous detection of CEA, CA19-9 and p53, for fast diagnosis of gastric cancer. A pilot study.	RI Stefan-van Staden, RM Ilie-Mihai, DC Gheorghe, S Gurzu	-
303	Anal Lett, 54(4), 729-741, 2020 https://doi.org/10.1080/00032719.2020.1780249	Electrochemical determination of 8-nitroguanine and 8-hydroxy-2`-deoxyguanosine in urine and whole blood using stochastic sensors	RI Stefan-van Staden, LR Balahura, HY Aboul-Enein	0.1716
304	Chirality, 33(1), 51-58, 2021 https://doi.org/10.1002/chir.23288	Chiral single-walled carbon nanotubes – as chiral selectors in multimode enantioselective sensors	RI Stefan-van Staden, IR Comnea	0.582

305	Medicine, 57(25), 57010025, 2021 https://doi.org/10.3390/medicina57010025	No Association between 25-Hydroxyvitamin D and Insulin Resistance or Thyroid Hormone Concentrations in a Romanian Observational Study.	RA Stoica, C Guja, A Pantea-Stoian, RI Stefan-van Staden, I Popa-Tudor, SD Stefan, R Ancuceanu, C Serafinceanu, C Ionescu Tîrgoviste,	0.0766
306	Electroanalysis, 33(1), 6-10, 2021 https://doi.org/10.1002/elan.202060118	Electroanalysis of interleukins 1β, 6, and 12 in biological samples using a needle stochastic sensor based on nanodiamond paste	RM Ilie-Mihai, SS Gheorghe, RI Stefan-van Staden, A Bratei	0.198
307 Q1	J Electrochem Soc, 168(3), 037509, 2021 https://doi.org/10.1149/1945-7111/abec92	Sulphur Doped Graphenes – as New Materials for the Design of 3D-Needle Stochastic Sensors	RM Ilie-Mihai, RI Stefan-van Staden, A Lungu-Moscalu, S Gurzu, F Pogacean, SM Pruneanu	0.304
308 Q1	J Electrochem Soc, 168(3), 037515, 2021 https://doi.org/10.1149/1945-7111/abeea2	Disposable Stochastic Sensor Based on Deposition of a Nanolayer of Silver on Silk for Molecular Recognition of Specific Biomarkers	RI Stefan-van Staden, SS Gheorghe, RM Ilie-Mihai, M Badulescu	0.456
309	Anal Lett, 54(18), 2921-2928, 2021 https://doi.org/10.1080/00032719.2021.1904409	Characterization of low-cost, robust, graphene-based amperometric dot microsensors for the determination of dopamine	JF van Staden, RI Stefan-van Staden	0.2575
310	Anal Bioanal Chem, 413(13), 3487-3492, 2021 https://doi.org/10.1007/s00216-021-03295-7	3D Stochastic microsensors for molecular recognition and determination of heregulin-α in biological samples	RI Stefan-van Staden, C Cioates Negut, SS Gheorghe, A. Ciorita	0.359
311 Q1	J Electrochem Soc., 168(4), 047504, 2021 https://doi.org/10.1149/1945-7111/abf260	Review—Trends in recent developments in electrochemical sensors for the determination of polycyclic aromatic hydrocarbons from water resources and catchment areas	IR Stancu, JF van Staden, RI Stefan-van Staden	0.608

312	Revista de Chimie, 72(2), 147-155, 2021 https://doi.org/10.37358/RC.21.2.8427	Some people and places important in the history of analytical chemistry in Romania	RI Stefan-van Staden, V. David, D. Thorburn Burns	-
313	UPB Sci. Bull., 83(4), 145-150, 2021 https://www.scientificbulletin.upb.ro/rev_docs_arhiva/full4a6_965249.pdf	Determination of dopamine in whole blood samples using a new electrochemical sensor based on graphene	SS Gheorghe, RM Ilie-Mihai, RI Stefan-van Staden	-
314	Electroanalysis, 33(7), 1778-1788, 2021 https://doi.org/10.1002/elan.202100132	Application of a tetraamino cobalt(II) phthalocyanine modified screen printed carbon electrode for the sensitive electrochemical determination of L-dopa in pharmaceutical and biological samples	R State, JF van Staden, C Stefanov, RI Stefan-van Staden	0.198
315 Q1	J Electrochem Soc., 168 (6), 067517, 2021 https://doi.org/10.1149/1945-7111/ac0a22	Review—Recent trends in supramolecular recognition of dopamine, tyrosine, and tryptophan, using electrochemical sensors	C Cioates Negut, RI Stefan-van Staden	0.912
316	Chemosensors, 9(6), 146, 2021. https://doi.org/10.3390/chemosensors9060146	Nitrogen, sulfur co-doped graphene as efficient electrode material for L-cysteine detection	C Varodi, F Pogăcean, A Cioriță, O Pană, B Cozar, T Radu, M Coroș, RI Stefan-van Staden, S Pruneanu	0.1272
317	RSC Adv., 11, 23301-23309, 2021 https://doi.org/10.1039/d1ra02066h	Stochastic biosensors based on N and S-doped graphene for the enantioanalysis of aspartic acid in biological samples	RI Stefan-van Staden, DC Gheorghe, RM Ilie-Mihai, L Barbu-Tudoran, SM Pruneanu	0.2498
318	Experimental Therapeutics Medicine, 22, 1033, 2021 https://doi.org/10.3892/etm.2021.10465	Subclinical hypothyroidism has no association with insulin resistance indices in adult females: A case-control study	RA Stoica, R Ancuceanu, SD Stefan, A Pantea Stoian, C Guja, RI Stefan-van Staden, I Popa-Tudor, C Serafinceanu, C Ionescu-Tirgoviste	-

319	J Pharm Biomed Anal, 205, 114292, 2021 https://doi.org/10.1016/j.jpba.2021.114292	Simultaneous determination of levodopa and dopamine from biological samples using 3D printed stochastic microsensors	C Cioates Negut, Sorin Sebastian Gheorghe, RI Stefan-van Staden, JF van Staden	0.27075
320	Life, 11, 894, 2021 https://doi.org/10.3390/life11090894	Fast screening method based on disposable stochastic sensor for sensitive detection of heregulin-α in biological samples	RI Stefan-van Staden, SS Gheorghe, C Cioates Negut, M Badulescu	0.2765
321	Rev de Chimie, 72(4), 22-34, 2021 https://doi.org/10.37358/RC.21.4.8453	Fast screening method of biological samples based on needle stochastic sensors for early detection of gastric cancer	RM Ilie-Mihai, DC Gheorghe, RI Stefan-van Staden, A Lungu-Moscalu, SM Pruneanu, JF van Staden	-
322	Sensors, 21, 6630, 2021 https://doi.org/10.3390/s21196630	Hydrothermal synthesis of nitrogen, boron co-doped graphene with enhanced electro-catalytic activity for cymoxanil detection	C Varodi, F Pogăcean, M Coros, L Magerusan, RI Stefan van Staden, S Pruneanu	0.219
323	Marine Drugs, 20(1), 25, 2022 https://doi.org/10.3390/md20010025	Mussel Shells - a Valuable Calcium Resource for Pharmaceutical Industry	M Mititelu, G Stanciu, D Drăgănescu, AC Ioniță, SM Neacșu, M Dinu, RI Stefan-van Staden, E Moroșan	0.15575
324	Anal Bioanal Chem, 414(5), 1797–1807, 2022 https://doi.org/10.1007/s00216-021-03807-5	Disposable stochastic sensors obtained using nanolayer deposition of copper, graphene, and copper-graphene composite on silk, for biomedical analysis	C Cioates Negut, RI Stefan-van Staden, M Badulescu, B Bita	0.359
325 Q1	J Electrochem Soc., 169, 017509, 2022 https://doi.org/10.1149/1945-7111/ac4a4c	Review. Recent trends on the electrochemical sensors used for the determination of tartrazine and Sunset Yellow FCF from food and beverage products	R Georgescu State, JF van Staden, RI Stefan-van Staden	0.608
326	Anal.Lett, 55(1), 85-92, 2022 https://doi.org/10.1080/00032719.2021.1917592	Enantioanalysis of aspartic acid using 3D stochastic sensors	IM Bogea, RI Stefan-van Staden, DC Gheorghe, RM Ilie-Mihai	0.12875

327	Nanomaterials, 12(3), 460, 2022 https://doi.org/10.3390/nano12030460	Stochastic microsensors based on carbon nanotubes decorated with Cu and Au nanoparticles, for molecular recognition of isocitrate dehydrogenases 1 and 2 in biological samples	RI Stefan-van Staden, C Cioates Negut, SS Gheorghe, P Sfirloaga	0.38925
328 Q1	Microchimica Acta, 189, 101, 2022 https://doi.org/10.1007/s00604-022-05214-8	2D Disposable Stochastic Sensors for Molecular Recognition and Quantification of Maspin in Biological Samples	RI Stefan-van Staden, RM Ilie-Mihai, DC Gheorghe, IM Bogea, M Badulescu	0.3182
329	Anal. Lett., 55(13), 2124-2131, 2022 https://doi.org/10.1080/00032719.2022.2047999	Stochastic Sensors for the Enantioselective Determination of Serine in Blood for the Early Diagnosis of Breast Cancer	OR Musat, RI Stefan-van Staden	0.2575
330	Anal Bioanal Chem, 414(12), 3667-3673, 2022 https://doi.org/10.1007/s00216-022-04007-5	Stochastic microsensors based on modified graphene for pattern recognition of maspin in biological samples	RI Stefan-van Staden, IM Bogea, RM Ilie-Mihai, DC Gheorghe, M Coros, SM Pruneanu	0.2393
331 Q1	J Electrochem Soc, 169, 037527, 2022 https://doi.org/10.1149/1945-7111/ac5cee	Facile detection of naphthalene with a 5,10,15,20-tetrakis(4-methoxyphenyl)-21H,23H-porphine nickel (II)/N-(1-Naphthyl) ethylenediamine dihydrochloride renewable graphene oxide paste electrode	IR Comnea-Stancu, JF van Staden, RI Stefan-van Staden	0.608
332	Revista de Chimie, 73(2), 1-16, 2022 https://doi.org/10.37358/RC.22.2.8515	Recent Electrochemical Methods Proposed for the Detection of Hepatitis C Virus. A Minireview	RM Ilie-Mihai, R.I. Stefan-van Staden, J.F. van Staden, H.Y. Aboul-Enein	-
333 Q1	J Electrochem Soc., 169 (3), 037518, 2022 https://doi.org/10.1149/1945-7111/ac5cea	Review-Progress in electroanalysis of p53, CEA and CA19-9. A minireview.	RM Ilie-Mihai, RI Stefan-van Staden, JF van Staden	0.608
334	J Pharm Biomed Anal, 214, 114725, 2022	Fast screening method for early diagnostic of gastric cancer based	RM Ilie-Mihai, DC Gheorghe, RI Stefan-van	0.2166

	https://doi.org/10.1016/j.jpba.2022.114725	on utilization of a chitosan – S-doped graphene - based needle stochastic sensors	Staden, A Lungu-Moscalu, JF van Staden	
335	ECS Sensors Plus, 1, 011603, 2022 https://doi.org/10.1149/2754-2726/ac5ddd	Challenges in Biomedical Analysis - From Classical Sensors to Stochastic Sensors	RI Stefan-van Staden	-
336	J Oncology, Article ID 1788004, 10 pages, 2022 https://doi.org/10.1155/2022/1788004	In-House Validated Map of Lymph Node Stations in a Prospective Cohort of Colorectal Cancer: A Tool for a Better Preoperative Staging	P Simu, I Jung, L Banias, ZZ Fulop, T Bara, I Simu, S Andone, RI Stefan-van Staden, CB Satala, I Halmaciu, S Gurzu	-
337	J.Pharm.Biomed.Anal., 215, 114758, 2022 https://doi.org/10.1016/j.jpba.2022.114758	Disposable stochastic sensors for fast analysis of ibuprofen, ketoprofen, and flurbiprofen in their topical pharmaceutical formulations	BM Ţuchiu, RI Stefan-van Staden, M Bădulescu, JF van Staden	0.27075
- 338	Journal of Clinical and Translational Endocrinology, 28, 100299, 2022 https://doi.org/10.1016/j.jcte.2022.100299	Interleukin-8, CXCL10, CXCL11 and their role in insulin resistance in adult females with subclinical hypothyroidism and prediabetes	RA Stoica, N Drăgana, R Ancuceanu, OI Geicu, C Guja, A Pantea-Stoian, DC Gheorghe, RI Stefan-van Staden, C Serafinceanu, A Costache, C Ionescu-Tîrgovişte	-
339	Anal. Bioanal.Chem., 414(22), 6521–6530, 2022 https://doi.org/10.1007/s00216-022-04209-x	NS Decorated Graphenes Modified with 2,3,7,8,12,13,17,18-Octaethyl-21H,23H-Porphine Manganese (III) Chloride Based 3D Needle Stochastic Sensors for Enantioanalysis of Arginine - a Key Factor in the Metabolomics and Early Detection of Gastric Cancer	RI Stefan-van Staden, MI Bogea, RM Ilie-Mihai, DC Gheorghe, HY Aboul-Enein, M Coros, SM Pruneanu	0.205

340	Sci Bull UPB, 84(4), 139-148, 2022 https://www.scientificbulletin.upb.ro/rev_docs_arhiva/fullec1_848745.pdf	Determination of D-serine from whole blood samples using an electrochemical sensor based on zinc (II)-5(4-carboxylphenyl)-10,15,20-tris(4phenoxyphenyl) porphyrine	OR Musat, RM Ilie-Mihai, RI Stefan-van Staden	-
341	Sci Bull UPB, 84(3), 121-130, 2022 https://www.scientificbulletin.upb.ro/rev_docs_arhiva/fullad2_503158.pdf	Determination of p53 from whole blood samples using an electrochemical sensor based on graphene decorated with N and S	IM Bogea, RM Ilie-Mihai, RI Stefan-van Staden	-
342	Anal Bioanal Chem, 414(23), 6813–6824, 2022 https://doi.org/10.1007/s00216-022-04244-8	Nanographene based electrochemical sensors for ultrasensitive determination of sorbic acid from bread and mayonnaise	RI Stefan-van Staden, AR Niculae, JF van Staden, P Sfirloaga, R State	0.2872
343	ECS Sensors Plus, 1(3), 030601, 2022 https://doi.org/10.1149/2754-2726/ac88e3	Mini-Review—Electrochemical sensors used for the determination of some antifungal azoles	BM Tuchiu, RI Stefan-van Staden, J (Koos) F van Staden	-
344	Sensors, 22(15), 5851, 2022 https://doi.org/10.3390/s22155851	Sulfur-doped graphene based electrochemical sensors for fast and sensitive determination of (R)-(+)-Limonene from beverages	AR Niculae, RI Stefan-van Staden, JF van Staden, R Georgescu State	0.3285
345	Sensors & Diagnostics, 1(5), 977-982, 2022 https://doi.org/10.1039/d2sd00119e	Ultrafast screening of whole blood for early prediction of diabetes by fractalkine detection	RI Stefan-van Staden, DC Gheorghe, RA Stoica	-
346	Sensors, 22(16), 6181, 2022 https://doi.org/10.3390/s22166181	Highly sensitive electrochemical detection of azithromycin with graphene-modified electrode	F Pogăcean, C Varodi, L Măgeruşan, RI Stefan-van Staden, S Pruneanu	0.2628

347	Nanomaterials, 12, 3111, 2022. https://doi.org/10.3390/nano12183111	Carbon Nanopowder Based Stochastic Sensor for Ultrasensitive assay of CA 15-3, CEA and HER2 in whole blood	RI Stefan-van Staden, OR Musat, DC Gheorghe, RM Ilie-Mihai, JKF van Staden	0.3114
348	Scientific Reports, 12, 16241, 2022 https://doi.org/10.1038/s41598-022-19883-1	V-set and immunoglobulin domain containing 1 (VSIG1) as an emerging target for epithelial–mesenchymal transition of gastric cancer	CB Satală, I Jung, Z. Kovacs, RI Stefan-van Staden, T Bara, C Molnar, AI Patrichi, S. Gurzu	0.2295
349	Chemosensors, 10(10), 380, 2022 https://doi.org/10.3390/chemosensors10100380	Simultaneous analysis of MLH1, MSH2, MSH6, PMS2 and KRAS in patients with gastric and colon cancer using stochastic sensors	RI Stefan-van Staden, DC Gheorghe, F Pogacean, S Pruneanu	0.28625
350	Talanta Open, 6, 100151, 2022 https://doi.org/10.1016/j.talo.2022.100151	Ultrasensitive assay of HER-1, HER-2, and heregulin-α in whole blood	RI Stefan-van Staden, OR Musat, DC Gheorghe, RM Ilie-Mihai	-
351	ACS Omega, 7(46), 42537−42544, 2022 https://doi.org/10.1021/acsomega.2c05904	N-methylfulleropyrrolidine based multimode sensor for determination of butoconazole nitrate	BM Țuchiu, RI Stefan-van Staden, JF van Staden, HY Aboul-Enein	0.3425
352	ECS Sensors Plus, 1, 031606, 2022 https://doi.org/10.1149/2754-2726/ac9740	Molecular recognition and quantification of MLH1, MSH2, MSH6, PMS2 and KRAS in biological samples	RI Stefan-van Staden Staden, RM Ilie-Mihai, M Coros, SM Pruneanu	-
353	Micromachine, 13(10), 1749, 2022. https://doi.org/10.3390/mi13101749	Molecular recognition and quantification of HER-3, HER-4 and HRG-α in whole blood and tissue samples using stochastic sensors	DC Gheorghe, Raluca-Ioana Stefan-van Staden	0.563
354	Chemistry, 4(4), 1382–1394, 2022. https://doi.org/10.3390/chemistry4040090	An Approach to the Simultaneous Determination of a Panel of Five Biomarkers for the Early	C Cioates Negut, RI Stefan-van Staden, P Sfirloaga	-

		Detection of Brain Cancer Using the Stochastic Method		
355	Anal Lett, 56(1), 25-41, 2023 https://doi.org/10.1080/00032719.2022.2083146	Minireview: current trends, and future challenges for the determination of patulin in food products	C Cioates Negut, RI Stefan-van Staden, JF van Staden	0.1716
356	Anal Lett, 56(6), 847-869, 2023 https://doi.org/10.1080/00032719.2022.2107659	Review- recent developments in electrochemical detection of atrazine	IR Comnea-Stancu, JF van Staden, RI Stefan-van Staden	0.1716
357	Electroanalysis, 35(3), e2200305, 2023 https://doi.org/10.1002/elan.202200305	Simultaneous molecular recognition of IL-2, IL-4, and TNF-α in biological samples	C Cioates Negut, RI Stefan-van Staden, P Sfirloaga	0.264
358	Chemosphere, 310, 136909, 2023 https://doi.org/10.1016/j.chemosphere.2022.136909	Simultaneous detection of anthracene and phenanthrene using a poly-Alizarin Red S/carbon paste electrode	IR Comnea-Stancu, JF van Staden, RI Stefan-van Staden, RN State	0.456
359 Q1	Food Chem, 407, 135158, 2023 https://doi.org/10.1016/j.foodchem.2022.135158	Effect of cooking and preserving on the heavy metals content of seafood, tuna and poultry	IA Chera-Anghel, RI Stefan-van Staden	1.6285
360	Sensors, 23(1), 344, 2023. https://doi.org/10.3390/s23010344	Gold nanoparticles/nanographene -based 3D sensors integrated in mini-platforms for thiamine detection	DC Gheorghe, JF van Staden, RI Stefan-van Staden, P. Sfirloaga	0.3285
361	Sensors, 23(1), 314, 2023. https://doi.org/10.3390/s23010314	Smart Portable Device Based on the Utilization of a 2D Disposable Paper Stochastic Sensor for Fast Ultrasensitive Screening of Food Samples for Bisphenols	RI Stefan-van Staden, IA Chera-Anghel, JF van Staden, DC Gheorghe, M Badulescu	0.2628

362 Q1	J. Electrochem. Soc., 170(3), 037503, 2023 https://doi.org/10.1149/1945-7111/acbe6f	Molecular recognition and determination of Heregulin-α and HER family (HER1–4) as biomarkers in biological samples	RI Stefan-van Staden, C Cioates Negut, P Sfirloaga	0.608
363	Microorganisms, 11(3), 745, 2023 https://doi.org/10.3390/microorganisms11030745	Antibacterial Enhancement of High-Efficiency Particulate Air Filters Modified with Graphene-Silver Hybrid Material	A Ciorîță, M Suciu, M Coroş, C Varodi, F Pogăcean, L Măgeruşan, V Mirel, RI Stefan-van Staden, S Pruneanu	0.117
364 Q1	J Electrochem Soc, 170(3), 037516, 2023 https://doi.org/10.1149/1945-7111/acc42d	Multimode detection platform based on 3D integrated sensor for fast on-site assay of methylprednisolone in its pharmaceutical formulation and surface water samples	BM Tuchiu, RI Stefan-van Staden, JF van Staden, P Sfirloaga	0.456
365	Life, 13(4), 1060, 2023 https://doi.org/10.3390/life13041060	Correlation between maspin levels in different biological samples and pathologic features in colorectal adenocarcinomas	AA Bratei, RI Stefan-van Staden	0.553
366	Symmetry, 15, 958, 2023 https://doi.org/10.3390/sym15050958	2D enantioselective disposable stochastic sensor for fast real-time enantioanalysis of glutamine in biological samples	RI Stefan-van Staden, MI Bogea, RM Ilie-Mihai, DC Gheorghe, M Badulescu	0.132
367 Q1	Microchim Acta, 190, 229, 2023 https://doi.org/10.1007/s00604-023-05811-1	Electrochemical platform based on molecularly imprinted polymer with zinc oxide nanoparticles and multiwalled carbon nanotubes modified screen-printed carbon electrode for amaranth determination	R. Georgescu-State, JF van Staden, RI Stefan-van Staden, RN State	0.39775
368	Chemosensors, 11(5), 259, 2023 https://doi.org/10.3390/chemosensors11050259	Enantioanalysis of leucine in whole blood samples using enantioselective, stochastic sensors	RI Stefan-van Staden, OR Musat	0.5725
369 Q1	J Electrochem Soc. 170, 057510, 2023	Miniplatforms for screening of biological samples for KRAS and four mismatch repair proteins as	RI Stefan-van Staden, AA Bratei, RM Ilie-	0.304

	https://doi.org/10.1149/1945-7111/acd358	new tools for fast screening for gastric and colon cancers	Mihai, DC Gheorghe, BM Tuchiu, S Gurzu	
370	RSC Advances, 13(26), 17628, 2023 https://doi.org/10.1039/d3ra02363j	Stochastic platform based on calix[6]arene and TiO2 modified reduced graphene oxide electrode for on-site determination of nonivamide in pharmaceutical and water samples	BM Tuchiu, RI Stefan-van Staden, JF van Staden	0.4163
371	Nanotechnology, 34, 345101, 2023 https://doi.org/10.1088/1361-6528/acd9d3	Nanoplatform-based analysis for the detection of HER3 and HER4 in gastric cancer	DC Gheorghe, RI Stefan-van Staden, RM Ilie-Mihai, P Sfirloaga	0.2925
372	Diagnostics, 13(11), 1857, 2023 https://doi.org/10.3390/diagnostics13111857	Minim invasive and fast diagnosis of gastric cancer based on correlations between maspin concentration levels in different biological samples and pathological features in gastric cancer patients	AA Bratei, RI Stefan-van Staden	0.542
373	ACS Food Sci Technol, 3(7), 1248–1254, 2023 https://doi.org/10.1021/acsfoodscitech.3c00136	Fast screening test of apple juice and surface water for patulin recognition and quantification	C Cioates Negut, RI Stefan-van Staden, JF van Staden	-
374	Chemosensors, 11, 446, 2023 https://doi.org/10.3390/chemosensors11080446	Disposable stochastic platform for the simultaneous determination of calcipotriol and betamethasone in pharmaceutical and surface water samples	BM Tuchiu, RI Stefan-van Staden, JF van Staden, HY Aboul-Enein	0.456
375	RSC Advances, 13, 24086-24092, 2023 https://doi.org/10.1039/d3ra04260j	Bioanalysis of MMR and KRAS – a Key Factor in Diagnosis of Colorectal Cancer	RI Stefan-van Staden, AA Bratei, RM Ilie-Mihai, DC Gheorghe, BM Tuchiu, S Gurzu	0.2498
376	J Pharm Biomed Anal, 235, 115630, 2023	New stochastic devices for simultaneous analysis of mismatch repair proteins and KRAS in biological samples	RI Stefan-van Staden, AA Bratei, RM Ilie-Mihai, DC Gheorghe, BM Tuchiu	0.2166

	https://doi.org/10.1016/j.jpba.2023.115630			
377	ChemElectroChem, 10(21), e2023002, 2023 https://doi.org/10.1002/celc.202300273	DNA mismatch repair assessment in gastric and colon cancers using stochastic microdisks	RI Stefan-van Staden, AA Bratei, RM Ilie-Mihai, DC Gheorghe, BM Tuchiu	0.2592
378	Microchem J., 194, 109288, 2023 https://doi.org/10.1016/j.microc.2023.109288	Ultrasensitive assay of 8-hydroxy-2'-deoxyguanosine in whole blood using carbon nanotubes based stochastic microsensors	RI Stefan-van Staden, OR Musat	0.635
379 Q1	J Electrochem Soc, 170, 097503, 2023 https://doi.org/10.1149/1945-7111/acf622	Molecular differentiation of cathepsins B and D, and of p53 protein, and their quantitative assay in biological samples	AA Bratei, RI Stefan-van Staden, RM Ilie-Mihai, DC Gheorghe	0.456
380	Sci Bull UPB, 85(4), 169-176, 2023 https://www.scientificbulletin.upb.ro/rev_docs_arhiva/rez433_915706.pdf	Sensitive electrochemical determination of betamethasone in DAIVOBET and in water samples	BM Tuchiu, RI Stefan-van Staden, JF van Staden	-
381	Sensors, 23(19), 8046, 2023 https://doi.org/10.3390/s23198046	Simultaneous assay of CA72-4, CA19-9, CEA and CA125 in biological samples using needle 3D stochastic microsensors	AA Bratei, RI Stefan-van Staden, RM Ilie-Mihai, DC Gheorghe	0.3285
382	Bull SChR, 30(2), 25-30, 2023 http://administrare.chimie.upb.ro/schr/doc/publicatii/buletinul-societatii-de-chimie-din-romania/2023-2.pdf	Stochastic sensors	RI Stefan-van Staden	-
383	Electroanalysis, 35(12), e202300248, 2023	Ultrasensitive assay of atrazine in food and water samples	RI Stefan-van Staden, RA Niculae, JF van Staden	0.264

	https://doi.org/10.1002/elan.202300248			
384	Anal. Biochem., 683, 115366, 2023 https://doi.org/10.1016/j.ab.2023.115366	Extraction of essential oil from Heliotropium bacciferum: Compositions determination by GC-MS and anti-inflammatory and antibacterial activities evaluation	M Hasni, N Belboukhari, K Sekkoum, RI Stefan-van Staden, ZA ALOthman, I Ali	0.211
385	Gastrointestinal Disorders, 5, 487-499, 2023 https://doi.org/10.3390/gidisord5040040	Differentiation between gastric and colorectal adenocarcinomas based on maspin, MLH1, PMS2 and K-Ras concentrations determined using stochastic sensors	AA Bratei, RI Stefan-van Staden	-
386 Q1	J Electrochem Soc, 170(11), 117516, 2023 https://doi.org/10.1149/1945-7111/ad0cd2	Enantioanalysis of serine using stochastic enantioselective sensors	RI Stefan-van Staden, CB Ion, R Georgescu-State	0.608
387	Electrochem Comm, 157, 107625, 2023 https://doi.org/10.1016/j.elecom.2023.107625	Fast on-site simultaneous electroanalysis of fusidic acid and betamethasone in pharmaceuticals and water samples using novel stochastic platform	BM Tuchiu, RI Stefan-van Staden, JF van Staden	0.474
388	Biomedicine, 11(12), 3213, 2023 https://doi.org/10.3390/biomedicines11123213	Correlations of MSH2 and MSH6 concentrations in different biological samples with clinicopathological features in colo-rectal adenocarcinoma patients, and their contribution to fast and early diagnosis of colorectal adenocarcinoma patients	AA Bratei, RI Stefan-van Staden	0.6245
389 Q1	J Electrochem Soc, 170(12), 127513, 2023 https://doi.org/10.1149/1945-7111/ad1585	Simultaneous assay of p53, HER3 and HER4 - a key factor in early detection of gastric cancer	C Cioates Negut, RI Stefan-van Staden, RM Ilie-Mihai, M Coros	0.456

390 Q1	Crit. Rev. Anal. Chem., 54(1), 1-10, 2024 https://doi.org/10.1080/10408347.2022.2045557	Mini-review: Electrochemical sensors used for the determination of water- and fat-soluble vitamins: B, D, K	DC Gheorghe, RI Stefan-van Staden, JF van Staden	0.544
391 Q1	Crit Rev Anal Chem, 54(1), 61-72, 2024 https://doi.org/10.1080/10408347.2022.2050348	Recent trends in ibuprofen and ketoprofen electrochemical quantification – a review	BM Ţuchiu, RI Stefan-van Staden, JF van Staden	0.544
392	Anal. Lett., 57(4),665–680, 2024 https://doi.org/10.1080/00032719.2023.2220847	Mini-Review–Recent innovations in corticosteroids determination using electrochemical sensors	BM Tuchiu, RI Stefan-van Staden, JF van Staden	0.1716
393	Medinformatics, 00, 000, 2024/accepted MS https://doi.org/10.47852/bonviewMEDIN32021546	The importance of KRAS quantification in different biological fluids for a clinicopathological characterization in colorectal cancer patients	AA Bratei, RI Stefan-van Staden	-
394	ACS Omega, 00, 000, 2024/accepted MS	Disposable stochastic miniplatform for simultaneous recognition and determination of vitamins B5, B7 and B9 in food and pharmaceutical compounds	RI Stefan-van Staden, EY Rasit, DC Gheorghe, JF van Staden	0.3425

Books and Chapters in Books

1. *"Quality and Reliability in Analytical Chemistry"*
   H.Y. Aboul-Enein, **R.I. Stefan** and G.E. Baiulescu
   CRC Press, Boca Raton, Florida, USA, 28 September 2000.

2. *"Electrochemical Sensors in Bioanalysis"*
   R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein
   Marcel Dekker Inc., New York, USA, 2001.

3. *"Laboratory Auditing for Quality and Regulatory Compliance"*
D.C. Springer, **R.I. Stefan** and J.F. van Staden
Taylor and Francis, New York, USA, 2005.

4. *"Recent developments of chemiluminescence sensors"* (Chapter 20)
X.R. Zhang, A.M. Garcia-Campana, W.R.G. Bayens, **R.I. Stefan**,
H.Y. Aboul-Enein and J.F. van Staden
in CHEMILUMINESCENCE IN ANALYTICAL CHEMISTRY.
A.M. Garcia-Campana and W.R.G. Baeyens (Editors)
Marcel Dekker, Inc., New York. USA, 2001.

5. *"Sequential Injection Analysis in HPLC"* (Chapter) in
ENCYCLOPEDIA OF CHROMATOGRAPHY
R.I. Stefan, H.Y. Aboul-Enein and J.F. van Staden
Jack Cazes (Editor)
Marcel Dekker, Inc., **New York. USA, 2001.**

6. *"Enantioselective Electrochemical Sensors"* (Chapter) in
SENSORS UPDATE, Volume 10
R.I. Stefan, H.Y. Aboul-Enein and J.F. van Staden
H. Baltes, G.K. Fedder, G. Korvink (Editors)
Wiley-VCH **,Weinheim , Germany, 2001.**

7. *"Biosensors Technology"* (Chapter 21) in
EWEING'S ANALYTICAL INSTRUMENTATION HANDBOOK
R.I. Stefan, H.Y. Aboul-Enein and J.F. van Staden
Jack Cazes (Editor)
Marcel Dekker, Inc., **New York. USA, 2004.**

8. *"Enantioselective Biosensors"*
(Chapter 13) in
CHIRAL SEPARATION TECHNIQUES. A PRACTICAL APPROACH.
R.I. Stefan, J.F. van Staden and H.Y. Aboul-Enein
G. Subramanian (Editor)
Wiley-VCH ,Weinheim , Germany, 2006.

9. *"Enantioselective, Potentiometric Membrane Electrodes. Design, mechanism of potential development and applications for pharmaceutical and biomedical analysis"* (Chapter 3) in
ELECTROCHEMICAL SENSOR ANALYSIS
R.I. Stefan-van Staden
S. Alegret, A Merkoci (Editors)
Elsevier, 2007.

10. *"Enantioanalysis of S-Captopril using an enantioselective, potentiometric membrane electrode"* (Procedure 3) in
ELECTROCHEMICAL SENSOR ANALYSIS
R.I. Stefan-van Staden, J.F. van Staden and H.Y. Aboul-Enein
S Alegret, A Merkoci (Eds)
Elsevier, Amsterdam, The Netherlands, (ISBN: 978-0-444-53053) 2007.

11. *"Electrochemical biosensors based on screen-printed electrodes. Applications for environmental and food analysis"* (Chapter) in
RECENT ADVANCES IN ANALYTICAL ELECTROCHEMISTRY
M. Tudorache, C. Bala and **R.I. Stefan**
K.I. Ozoemena (Editor)

Research Signpost, (978-81-7895-274-1) 2007.

12. *"Mechanism of potential development for potentiometric sensors, based on modeling of interaction between electrochemically active compounds from the membrane and analyte"* (Chapter) in
CHEMICAL SENSORS: SIMULATION AND MODELING
R.I. Stefan-van Staden
G. Korotcenkov (Editor)
Momentum Press, LLC, 2013.

13. *"Electrochemical Sensors Based on Nanostructured Materials"* (Chapter) in
HANDBOOK OF NANOELECTROCHEMISTRY. ELECTROCHEMICAL SYNTHESIS METHODS, PROPERTIES AND CHARACTERIZATION TECHNIQUES
I. Moldoveanu, **R.I. Stefan-van Staden,** J.F. van Staden
Mahmood Aliofkhazraei, Abdel Salam Hamdy Makhlouf (Editors)
Springer International Publishing Switzerland, 2015. (ISBN: 978-3-319-15207-3)

14. New Trends in Enantioanalysis of Pharmaceutical Compounds using Electrochemical Sensors (Chapter) in
Recent Advances in Analytical Techniques Vol. 2. Novel Developments in Pharmaceutical and Biomedical Analysis
RI Stefan-van Staden
Atta-ur-Rahman, Sibel A. Ozkan, Rida Ahmed(Eds.)
Bentham, 2018 (ISSN: 2542-5617) (Print)

In the past 5 years:

15. Single-walled carbon nanotubes based sensors for biomedical analysis (Chapter 7) in
Advances in Chemistry Research, Volume 74
C. Cioates Negut and **R.-I. Stefan-van Staden**
James C. Taylor (Ed.)
Nova, Science and Technology, 2022 (ISBN: 979-8-88697-212-2)

16. Functionalized Chitosan and Biomedical Devices (Chapter 5) in
Chitosan Nanocomposites-Bionanomechanical Applications
D.C. Gheorghe, R.M. Ilie-Mihai, C. Cioates Negut, R.I. Stefan-van Staden
Sarat Kumar Swain (Ed.)
Springer Nature, Singapore, 2023

17. Graphene-based nanocomposites for H_2O_2 sensing (Chapter 10) in
Graphene-based nanocomposite sensors
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Royal Society of Chemistry, 2023.

18. Graphene-based Nanocomposites for Hormone Detection (Chapter 19) in
Graphene-based nanocomposite sensors
RM Ilie-Mihai, DC Gheorghe, RI Stefan-van Staden
Royal Society of Chemistry, 2023.