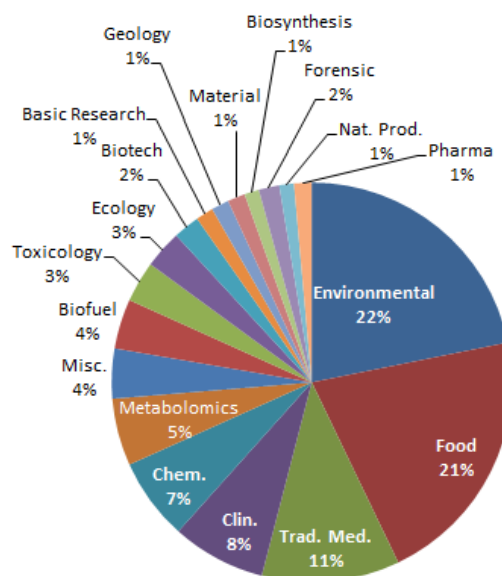


## Přehled aplikací GC-MS

Typ MS	Časové období	Celkem	Aplikace	Publikace	Ostatní
<b>Celkem</b>		<b>671</b>	<b>118</b>	<b>513</b>	<b>40</b>
QTOF	2011-2013	33	5	13	15
TQ	2008-2013	172	37	128	7
MSD	Aplikace: 2005-14 Publikace: 2013/14	466	76	372	18

\* Zdroj: Google Scholar, e-Library

### GC-MS (Q) 5975, 5977 Typy aplikací



### Potravinářské aplikace GC-MS (Q) 5975, 5977

#### Těkavé látky (VOC)

- Chemical properties investigation of commercial cigarettes by a “pseudo” targeted method using GC-MS-selected ions monitoring
- Geographical origin identification of propolis using GC-MS and electronic nose combined with principal component analysis
- Influence of harvest maturity and fruit logistics on pineapple (*Ananas comosus* [L.] Merr.) volatiles assessed by headspace solid phase microextraction and gas chromatography-mass spectrometry (HS-SPME-GC/MS)
- Volatile Composition of Macedonian and Hungarian Wines Assessed by GC/MS
- Effect of salt reduction on aroma active compounds from dry fermented sausages

- **Research on Predominant Volatile Compounds of Grass Carp Meat**
- **Potential for Increasing Southern Highbush Blueberry Flavor Acceptance by Breeding for Major Volatile Components**
- **Contributions of non-volatile and volatile compounds to the umami taste and overall flavour of shiitake mushroom extracts and their application as flavour enhancers in cooked minced meat**
- **Changes in nutritional constituents, anthocyanins, and volatile compounds during the processing of black rice tea**
- **Characterization of Volatile Components in Makgeolli, a Traditional Korean Rice Wine, with or without Pasteurization, During Storage**
- **Seasonal variation in chemical composition, aroma volatiles and antioxidant capacity of pomegranate during fruit development**
- **Flavour profiles of three novel acidic varieties of muskmelon (*Cucumis melo* L.)**
- **Volatile compounds in medlar fruit (*Mespilus germanica* L.) at two ripening stages**
- **Effect of modified atmosphere packaging and storage temperature on volatile composition and postharvest life of minimally-processed pomegranate arils (cvs. 'Acco' and 'Herskawitz')**
- **A comparative study on oxidative and hydrolytic stability of monovarietal extra virgin olive oil in bakery products**
- **Use of hydrodistillation and headspace solid-phase microextraction to characterize the volatile composition of different hop cultivars**
- **Lipid oxidation in baked products: Impact of formula and process on the generation of volatile compounds**
- **Quantitative fingerprinting by headspace—Two-dimensional comprehensive gas chromatography—mass spectrometry of solid matrices: Some challenging aspects of the exhaustive assessment of food volatiles**
- **Sensory and instrumental analysis of medium and long shelf-life Charentais cantaloupe melons (*Cucumis melo* L.) harvested at different maturities**
- **Study of the suitability of two hop cultivars for making herb liqueurs: volatile composition, sensory analysis, and consumer study**
- **Volatile Profiling of U.S. Cabernet Sauvignon Wines Using HS-SPME and the Agilent 5975 Series GC/MSD System: Relating the Chemical Profile to Sensory Properties**
- **Chemometric Profiling of Whiskey Using the 5977A GC/MSD**
- **Development and Analysis of Aroma Compounds of Low Alcohol Blue Berry Wine**
- **Variations in Physicochemical Properties of Chinese Fenjiu During Storage and High-Gravity Technology of Liquor Aging**

- Development of a simultaneous multiple solid-phase microextraction-single shot-gas chromatography/mass spectrometry method and application to aroma profile analysis of commercial coffee
- Influence of heating and acidification on the flavor of whey protein isolate

## **Mastné kyseliny, lipidy ad.**

- Ipomoea batatas (L.) Lam.: A Rich Source of Lipophilic Phytochemicals
- Effect of different drying techniques on the aroma profile of Thymus vulgaris analyzed by GC–MS and sensory profile methods
- Discrimination of commercial cheeses from fatty acid profiles and phytosterol contents obtained by GC and PCA
- Erucic acid evaluation in rapeseed and canola oil by Fourier transform-infrared spectroscopy
- The Hurdle Effect of Bunium persicum Essential Oil, Smoke and NaCl for Controlling the Listeria monocytogenes Growth in Fish Model Systems
- Evaluation of the Physicochemical Properties and Antimicrobial Activities of Bioactive Biodegradable Films
- Chemical Composition and Antibacterial Activity of Essential Oils of Iranian Herbs Against Staphylococcus aureus Isolated from Milk
- Effect of calcium on the kinetics of free fatty acid release during in vitro lipid digestion in model emulsions
- Lipid oxidation in baked products: Impact of formula and process on the generation of volatile compounds
- Consequence of fatty acids profile including trans fat in chocolate and pastry samples
- Qualitative analysis of hexane flour extract of spelt
- Development of a fatty acid fingerprint of white apricot almond oil by gas chromatography and gas chromatography–mass spectrometry
- Aromatic and sensorial profiles of young Cabernet Sauvignon wines fermented by different Chinese autochthonous Saccharomyces cerevisiae strains
- Independent Column Temperature Control Using an LTM Oven Module for Improved Multidimensional Separation of Chiral Compounds

## **Mykotoxiny**

- Natural co-occurrence of aflatoxins and deoxynivalenol in poultry feed in Pakistan
- GC/MS of Native Patulin in Apple Juice and Cider

## Alergeny

- **GC/MS Identification of Flavor and Fragrance Allergens in Some Common Snack Foods Using an Agilent J&W DB-17ms Capillary GC Column**
- **Analysis of Suspected Flavor and Fragrance Allergens in Perfumes Using Two-Dimensional GC with Independent Column Temperature Control Using an LTM Oven Module**
- **Determination of Allergens in Fragrance Products Using Agilent Deconvolution Reporting Software**

## Antokyany

- **Changes in nutritional constituents, anthocyanins, and volatile compounds during the processing of black rice tea**
- **The effects of bagging and debagging on external fruit quality, metabolites, and the expression of anthocyanin biosynthetic genes in 'Jonagold' apple (*Malus domestica* Borkh.)**

## Melamin

- **Rapid Screening of Melamine and Cyanuric Acid in Milk Products Using Agilent J&WHP-5ms GC Column and Agilent 7890A/5975C GC/MSD with Column Backflushing**
- **Trace-Level Analysis of Melamine in Milk Products on Agilent 7890A/5975C GC/MSD Using a New Agilent J&W DB-5ms Ultra Inert Column and SampliQ SCX Cartridges**

## Pesticidy

- **Automated QuEChERS Tips for Analysis of Pesticide Residues in Fruits and Vegetables by GC-MS**
- **Determination of dichlobenil and its major metabolite (BAM) in onions by PTV-GC-MS using PARAFAC2 and experimental design methodology**
- **Multi pesticide and PCB residues in Nile tilapia and catfish in Assiut city, Egypt**
- **Organochlorine pesticide residues in skin, flesh and whole carrots (*Daucus carota*) from markets around Lake Victoria basin, Uganda**
- **Dissipation and Residue of Bifenthrin in Wheat under Field Conditions**
- **Analysis and risk assessment of ethyl carbamate in various fermented foods**
- **Comprehensive Pesticide Analysis in Juice Using a Combination of GC/MS and LC/MS Methods**
- **Screening Foodstuffs for Pesticides and Other Organic Chemical Contaminants Using Full Scan GC/MS and Mass Hunter Quant Target Deconvolution**

- **Replacing Multiple 50-Minute GC and GC-MS/SIM Analyses with One 15-Minute Full-Scan GC-MS Analysis for Nontargeted Pesticides Screening and >10x Productivity Gain**
- **Analysis of Pesticide Residues in Apple by GC/MS using Agilent Bond Elut QuEChERS Kits for Preinjection Cleanup**
- **Analysis of Pesticide Residues in Spinach Using Agilent Bond Elut QuEChERS AOAC Kits by GC/MS**
- **Analysis of Pesticide Residues in Apple Using Agilent Bond Elut QuEChERS EN Kits by GC/MS**
- **Analysis of Pesticide Residues in Apple Using Agilent Bond Elut QuEChERS AOAC Kits by GC/MS**
- **A Method for the Trace Analysis of 175 Pesticides Using the Agilent Triple Quadrupole GC/MS/MS**
- **Using RTL and 3-Way Splitter to Identify Unknown in Strawberry Extract**
- **Identifying Pesticides with Full Scan, SIM, uECD, and FPD from a Single Injection**
- **Ultra Inert (UI) Wool Liner Performance Using an Agilent J&W DB-35ms UI Column**
- **Optimizing Recoveries of Planar Pesticides in Spinach Using Toluene and Agilent Bond Elut AOAC QuEChERS Kits with Graphitized Carbon**
- **Pesticides Analysis Using the Agilent 5977A Series GC/MSD**
- **Screening Foodstuffs for Pesticides and Other Organic Chemical Contaminants Using Full Scan GC/MS and MassHunter Quant Target Deconvolution**
- **Dissipation Rates and Final Residues of Kresoxim-Methyl in Strawberry and Soil**

## **PAU**

- **Analysis of Polynuclear Aromatic Hydrocarbons in Grilled Hamburger**
- **PAHs in Chocolate and Peanuts with Agilent J&W Select PAH and Longer GC Columns**

## **Ftaláty, změkčovadla**

- **Phthalates analysis in fruit juice using an Agilent 5977E GC-MSD**
- **Determination of phthalate esters in liquor samples by vortex-assisted surfactant-enhanced-emulsification liquid-liquid microextraction followed by GC-MS**
- **Evaluation of the Equality of Non-Polar Capillary Columns in GC/MS Analysis of Food Contact Plastics.**

- **Rapid, Sensitive, and Robust Detection of Phthalates in Food Using GC/MS or LC/MS**

## **Ostatní**

- **Comparing sugar components of cereal and pseudocereal flour by GC–MS analysis**
- **New Analytical Tools for the Determination of Persistent Organic Pollutants (POPs) in Fatty Food and Beverage Matrices Using QuEChERS Extraction/Cleanup and Gas Chromatography (GC) Analysis**
- **Determination of Terpenoids in Plant Leaves by GC-MS: Development of the Method and Application to Ocimum basilicum and Nicotiana langsdorffii**
- **Improvement of a gas chromatographic method for the analysis of iminosugars and other bioactive carbohydrates**
- **Metabolic Control of Higher Alcohols Producing by Saccharomyces cerevisia in Mulberry Wine Brewing**
- **Changes in the mesocarp of Annona cherimola Mill. ‘Madeira’ during postharvest ripening**
- **Multi-analyte approach for determining the extraction of tobacco constituents from pouched snus by consumers during use**
- **A comparative study of three modifications of the QuEChERS method for determination of endocrine disrupting pesticide residues in lemon matrices by fast GC-MS**
- **Detection of a metabolite produced by acidophilic spoilage-causing bacteria using different analytical and sensory methods**
- **Flavour Science, 1st Edition**
- **Characterizing the Chemical and Sensory Profiles of United States Cabernet Sauvignon Wines and Blends**
- **Determination of clenbuterol in meat samples with ELISA and GC-MS method**
- **Structural Basis for the Enzymatic Formation of the Key Strawberry Flavor Compound 4-Hydroxy-2,5-dimethyl-3(2H)-furanone**
- **Maximising umami taste in meat using natural ingredients: effects on chemistry, sensory perception and hedonic liking in young and old consumers**
- **Bioproduction of Natural Isoamyl Esters from Coconut Cream as Catalysed by Lipases**
- **Analysis of amino acids in tobacco by derivatization and dispersive liquid–liquid microextraction based on solidification of floating organic droplet method**
- **Updated evaluation of the migration of styrene monomer and oligomers from polystyrene food-contact materials to foods and food simulants**

- **Aromatic and sensorial profiles of young Cabernet Sauvignon wines fermented by different Chinese autochthonous *Saccharomyces cerevisiae* strains**
- **Characterisation of secondary metabolites in saffron from central Italy (Cascia, Umbria)**
- **Detecting Contamination in Shochu Using the Agilent GC/MSD, Mass Profiler Professional, and Sample Class Prediction Models**
- **Screen Beer by GC/MS Static Headspace with the Agilent J&W DB-624UI Capillary Column**
- **GC/MS of Acrylamide in Air-popped Potato Snacks with Bond Elut C18 Sample Prep**
- **Screening for Pesticides in Food Using the Japanese Positive List Pesticide Method: Benefits of Using GC/MS with Deconvolution Reporting Software and a Retention Time Locked Mass Spectral Database**
- **Determination of 3-MCPD Diesters and Monoesters in Vegetable Oils and Fatsoesters in Vegetable Oils and Fats**