



Nominated Substances for the BfR MEAL Study (Status: 2023)

	Core module (elements and environmental contaminants)	<p>Elements: aluminium, antimony, arsenic, barium, lead, cadmium, cobalt, lithium, methyl mercury, nickel, nitrate, mercury, silver, thallium, vanadium, tin</p> <p>Arsenic species: inorganic arsenic, arsenobetaine (AsB), dimethylarsinic acid (DMA), monomethylarsonic acid (MMA)</p> <p>Organotin compounds: tetrabutyltin (TeBT), tributyltin (TBT), dibutyltin (DBT), monobutyltin (MBT), triphenyltin (TPT), diphenyltin (DPT), monophenyltin (MPT)</p> <p>Dioxins/furans, dioxin-like polychlorinated biphenyls (dl-PCB), non-dioxin-like polychlorinated biphenyls (ndl-PCB)</p> <p>Polybrominated diphenyl ethers (PBDE)</p>
	Perfluoroalkyl substances (PFAS)	Perfluorooctane sulfonic acid, perfluorooctanoic acid
	Mycotoxins	Aflatoxins, alternaria toxins, beauvericin, citrinin, enniatins, ergot alkaloids, fumonisins, ochroatoxin A, patulin, type A trichothecenes, type B trichothecenes, zearalenone
	Process contaminants	Acrylamide, glycidol, polycyclic aromatic hydrocarbons (PAH), 2- and 3-MCPD group
	Food additives	<p>Benzoates: benzoic acid, calcium benzoate, potassium benzoate, sodium benzoate</p> <p>Nitrites: potassium nitrite, sodium nitrite</p> <p>Sorbates: potassium sorbate, sorbic acid</p> <p>Sulphites: calcium hydrogen sulphite, calcium sulphite, potassium hydrogen sulphite, potassium metabisulphite, sodium hydrogen sulphite, sodium metabisulphite, sodium sulphite, sulphur dioxide</p>
	Nutrients	<p>Vitamins: vitamin A (retinol), vitamin E (tocopherols), vitamin K1, vitamin K2, β-carotene, folic acid</p> <p>Bulk elements: calcium, chloride, potassium, magnesium, sodium, phosphorus</p> <p>Trace elements: chromium, copper, fluoride, iodine, manganese, molybdenum, selenium, zinc</p>
	Pesticide residues	Boscalid, captan/tetrahydrophthalimide, chlorate, chlormequat, chlorpyrifos, cyantraniliprole, cypermethrin, cypromidol, deltamethrin, difenoconazole, dimethoate, ethylenethiourea (ETU), fluopyram, glyphosate/aminomethyl-phosphonic acid (AMPA), hexachlorobenzen, hexythiazox, imazalil, indoxacarb, iprodion, lambda-cyhalothrin, myclobutanil, omethoat, perchlorate, pirimicarb, pirimicarb-desmethyl, propylenthiourea (PTU), pyraclostrobin, pyrimethanil, spinosad, thiabendazole, thiadiazole, triflumuron, 1,2,4-triazole, triazole acetic acid, triazole alanine, triazole lactic acid
	Pharmacologically active substances	<p>Aminoglycosides: dihydrostreptomycin, gentamycin, neomycin, spectinomycin, streptomycin</p> <p>Amphenicoles: florfenicol</p> <p>Chinolones: ciprofloxacin, danofloxacin, enrofloxacin, marbofloxacin</p> <p>Diaminopyrimidine derivates: trimethoprim</p> <p>Coccidiostats: dinitrocarbanilides, lasalocid, maduramycin, monensin, narasin</p> <p>Macrolides: erythromycin, gamithromycin, tildipirosin, tilmicosin, tulathromycin, tylosin</p> <p>Penicillins: amoxicillin, benzylpenicillin</p> <p>Sulfonamides: sulfadiazine, sulfadimethoxine, sulfadimidine, sulfadoxine, sulfathiazol</p> <p>Tetracyclines: chlortetracycline, doxycycline, epi-chlortetracycline, epi-tetracycline, epi-oxytetracycline, oxytetracycline, tetracycline</p>
	Substances migrating from food contact materials	<p>Mineral oil saturated hydrocarbons (MOSH), mineral oil aromatic hydrocarbons (MOAH)</p> <p>Plasticisers</p> <p>2,4-di-tert-butylphenol</p>