

MassTox[®] TDM Series A

Therapeutic Drug Monitoring by LC-MS/MS



THERAPEUTIC DRUG MONITORING

ROBOTIC SOLUTION
MassSTAR
NOW AVAILABLE

- ▶ Modular system for therapeutic drug monitoring
- ▶ 1 Analytical column – 1 sample prep – 200 parameters
- ▶ Almost all parameters safeguarded by internal standards
- ▶ 3PLUS1[®] or 6PLUS1[®] multilevel calibrator sets
- ▶ *MassCheck*[®] plasma controls
- ▶ Continuously extended parameter menu

Modular System for Therapeutic Drug Monitoring by LC-MS/MS

The **MassTox**[®] TDM Series A from Chromsystems allows the fast and efficient monitoring of 200 parameters without column switching or change of the mobile phases, thereby helping to minimise the workload in the laboratory. The modular system has been comprehensively validated and provides everything that is required for the analysis. Reagents can be combined

to meet the individual needs. The evaluation of the data generated by the assays – from batch generation through data mining to reporting – can be simplified and accelerated with the **CSQUANT**[®] software. Furthermore, in combination with the robotic solution **MassSTAR**, the sample preparation of approximately 100 parameters can be automated.

The three components of **MassTox**[®] TDM Series A

MassTox[®] Basic Kit A (order no. 92111)

The Basic Kit A used for all determinations contains all components required for a complete sample preparation and all necessary mobile phases.

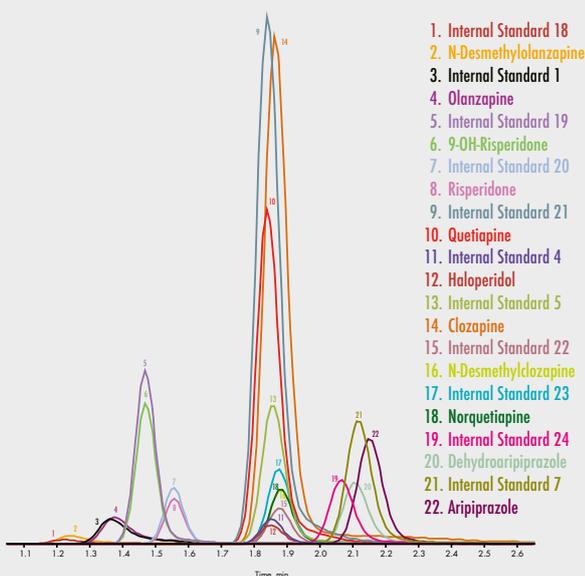
MassTox[®] MasterColumn[®] A (order no. 92110)

The analytical column enables the analysis of 200 parameters. No column switching or changes in the setup of the massspectrometer are required.

MassTox[®] TDM Parameter Sets (order no. 92912/XT-92924)

The parameter menu of 200 analytes is divided into 13 parameter sets. All of them contain all relevant calibrators, quality controls and internal standards.

MassTox[®] Neuroleptics 1/*EXTENDED*

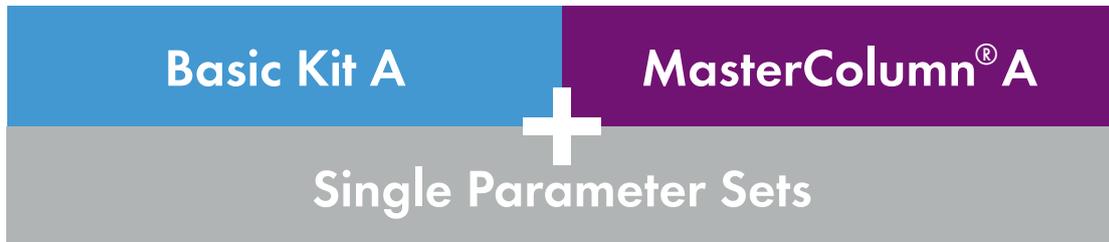
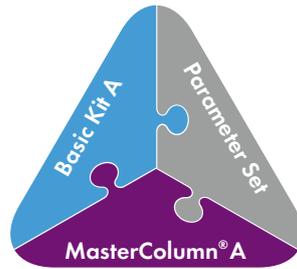


Representative Chromatogram of a Parameter Set

Identical Sample Preparation for all Parameter Sets:*

- 1 Add 800 µl Internal Standard Mix to 12 ml Precipitation Reagent (= mixture A).
- 2 Pipette 50 µl sample/calibrator/**MassCheck**[®] control into a 1.5 ml reaction vial.
- 3 Add 25 µl Extraction Buffer, mix briefly (vortex) and incubate 2 min.
- 4 Add 250 µl of mixture A, mix 30 s (vortex) and centrifuge 5 min.
- 5 Dilute supernatant with Dilution Buffer (depending on instrument sensitivity) and inject into LC-MS/MS system.

*The information on the sample preparation presented here is not sufficient for use in the laboratory. For a detailed step by step description, please refer to the instruction manual.



Antiarrhythmic Drugs	Antidepressants 1/ <i>EXTENDED</i>	Antidepressants 2/Psychostimulants/ <i>EXTENDED</i>
Anti-HIV Drugs	Antiepileptic Drugs All-in-One Method	Antimycotic Drugs/ <i>EXTENDED</i>
Benzodiazepines 1	Benzodiazepines 2	Mycophenolic Acid
Neuroleptics 1/ <i>EXTENDED</i>	Neuroleptics 2/ <i>EXTENDED 2</i>	Tricyclic Antidepressants TCA 1
Tricyclic Antidepressants TCA 2	CONTINUOUSLY EXTENDED >	

Automated sample preparation – saving time and resources

- ▶ CE-IVD validated workflows
- ▶ Walkaway solution with standardised hardware and software
- ▶ Full traceability and regulatory compliance
- ▶ Graphical User Interface (GUI) for simple instrument handling

MassSTAR is a CE-validated full walkaway solution specifically designed for automating clinical LC-MS/MS sample preparation with Chromsystems assays, including **MassTox®** TDM Series A.

The assays, in combination with MassSTAR, offer a standardised CE-IVD-conforming workflow for clinical laboratories soon also in line with IVDR. The solution has been developed with clinical laboratories in mind, offering user comfort, regulatory conformity and flexibility.

For further details, please contact your local sales representative or visit: chromsystems.com/masstar.



MassTox[®] TDM Series A – 200 Analytes

Parameter Menu

Antiarrhythmic Drugs (92923)

Acebutolol
Ajmaline
Amiodarone
Desethylamiodarone
Aprindine
Atenolol
Bisoprolol
Diltiazem
Disopyramide
Dronedaron
Debuthyl-dronedaron
Flecainide
Flunarizine
Gallopamil
Lidocaine
Metoprolol
Mexiletine
Propafenone
Propranolol
Quinidine
Hydroquinidine
Sotalol
Tocainide
Verapamil
Norverapamil

Antiepileptic Drugs All-in-One Method (92921/XT)

Brivaracetam
Carbamazepine
Carbamazepine-10,11-epoxide
10-OH-Carbamazepine
10-11-Dihydroxycarbamazepine
Oxycarbamazepine
Desmethyimesuximide
Ethosuximide
Felbamate
Gabapentin
Lacosamide
Lamotrigine
Levetiracetam
Perampamil
Phenobarbital
Phenylethylmalonamide (PEMA)
Phenytoin
Pregabalin
Primidone
Retigabine
Rufinamide
Stiripentol
Sultiame
Tiagabine
Theophylline
Topiramate
Valproic acid
Vigabatrin
Zonisamide

Antidepressants 1/EXTENDED (92913/XT)

Citalopram
N-Desmethylcitalopram
Duloxetine
Fluoxetine
Desmethylfluoxetine
Fluvoxamine
Mirtazapine
N-Desmethylmirtazapine
Paroxetine
Sertraline
N-Desmethylsertraline
Venlafaxine
O-Desmethylvenlafaxine

Antidepressants 2/ Psychostimulants/EXTENDED (92915/XT)

Atomoxetine
Bupropion
Erythro-Dihydrobupropion
Hydroxybupropion
Threo-Dihydrobupropion
Clomethiazol
Dosulepin
N-Desmethyl-dosulepin
Methylphenidate
Mianserin
Milnacipran
Moclobemid
Opipramol
Reboxetine
Ritalinic acid
Tianeptin
Tranlycypromin
Trazodone
Vilazodone
Vortioxetin

Anti-HIV Drugs (92924)

Amprenavir
Atazanavir
Darunavir
Delavirdine
Efavirenz
Elvitegravir
Etravirine
Indinavir
Lopinavir
Maraviroc
Nelfinavir
Nelfinavir-M8
Nevirapine
Raltegravir
Rilpivirine
Ritonavir
Saquinavir

Antimycotic Drugs/EXTENDED (92922/XT)

5-Flucytosine
Anidulafungin
Caspofungin
Fluconazole
Isavuconazole
Itraconazole
Hydroxyitraconazole
Ketoconazole
Miconazole
Posaconazole
Voriconazole

Benzodiazepines 1 (92917)

Chlordiazepoxide
Clobazam
Nordlobazam
Demoxepam
Diazepam
Nordiazepam
Medazepam
Midazolam
1-OH-Midazolam
Oxazepam
Prazepam
Temazepam
Tetraepam

Benzodiazepines 2 (92918)

Alprazolam
Bromazepam
Clonazepam
Flunitrazepam
Flurazepam
Desalkylflurazepam
Lorazepam
Lormetazepam
Nitrazepam
Triazolam

Mycophenolic Acid (92916)

Mycophenolic acid
Mycophenolic acid glucuronide

Neuroleptics 1/EXTENDED (92912/XT)

Aripiprazole
Dehydroaripiprazole
Clozapine
N-Desmethylclozapine
Haloperidol
Olanzapine
N-Desmethylolanzapine
Quetiapine
Norquetiapine
Risperidone
9-OH-Risperidone

Neuroleptics 2/EXTENDED 2 (92914/XT2)

Amisulpride
Benperidole
Brexipiprazole
Bromperidole
Cariprazine
Chlorpromazine
Chlorprothixene
Flupentixole
Fluphenazine
Guanfacin
Iloperidone
Levomepromazine
Loxapine
Lurasidone
Melperone
Perazine
Perphenazine
Pimozide
Pipamperone
Promethazine
Prothipendyl
Sertindole
Sulforidazine
Sulpiride
Thioridazine
Ziprasidone
Zotepine
Zuclophenthixole

Tricyclic Antidepressants TCA1 (92919)

Amitriptyline
Desipramine
Doxepin
Nordoxepin
Imipramine
Nortriptyline

Tricyclic Antidepressants TCA2 (92920)

Clomipramine
Norclomipramine
Maprotiline
Normaprotiline
Protriptyline
Trimipramine
Nortrimipramine

These products are not available in all countries. Please contact your local Chromsystems sales representative for availability in your region.