

# Clinical chemistry

## Hitachi 717 programs

### Warning!

The given programs must be used only as guideline.

To check the reagent correct setting on the instrument, use only good quality control sera and work in accordance with good laboratory practice. Always check instrumental factors.

This company couldn't be considered responsible for instrumental wrong programming.

**Chema**  
D I A G N O S T I C A

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**Analyzer: Hitachi 717**

Application: **ACID PHOSPHATASE (TOTAL)** - Codes AC 0120 / 0245 TC  
Preparation: POWDER SINGLE REAGENT. FOLLOW PREPARATION PROGRAM INDICATED IN INSERT SHEET. INSTALL AS R1  
Storage: REFRIGERATE AT 2-8°C

**PROGRAM**

TEST:	ACP
ASSAY CODE:	RATE-A - 30 - 50
SAMPLE VOL:	20
R1 VOLUME:	230
R2 VOLUME:	0
WAVELENGTHS:	700 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0 - 5.1
PANIC VALUE:	0 - 75

X - X\* user def

**Analyzer: Hitachi 717**

Application: **ACID PHOSPHATASE (NON PROSTATIC)** - Codes AC 0120 / 0245 TC  
Preparation: POWDER SINGLE REAGENT. FOLLOW PREPARATION PROGRAM INDICATED IN INSERT SHEET. INSTALL AS R1  
Storage: REFRIGERATE AT 2-8°C

**PROGRAM**

TEST:	ACP
ASSAY CODE:	RATE-A - 30 - 50
SAMPLE VOL:	20
R1 VOLUME:	230
R2 VOLUME:	0
WAVELENGTHS:	700 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0 - 4.1
PANIC VALUE:	0 - 75

X - X\* user def

**Analyzer: Hitachi 717**

Application: **ALBUMIN** - Codes BC 0500 / 1500 CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	ALB
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 600
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	3.8 - 5.1
PANIC VALUE:	1.0 - 7.0

X - X\* user def

**Analyzer: Hitachi 717**Application: **ALKALINE PHOSPHATASE FL** - Codes AL F245 / F400 / F600 CHPreparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B

Storage: REFRIGERATE AT 2-8°C

Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	ALP
ASSAY CODE:	RATE-A - 35 - 48
SAMPLE VOL:	4
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	660 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	64 - 306
PANIC VALUE:	5 - 2000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **AMYLASE FL** - Codes AM F120 / F245 / F600 CH  
Preparation: R1 -LIQUID READY TO USE SINGLE REAGENT  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST: AMY  
ASSAY CODE: RATE-A - 06 - 20  
SAMPLE VOL: 10  
R1 VOLUME: 250  
R2 VOLUME: 0  
WAVELENGTHS: 660 - 415  
CALIB METHOD: 1 - 0  
STD 1 CONC. POS.: X - X\*  
STD 2 CONC. POS.: 0 - 0  
STD 3 CONC. POS.: 0 - 0  
STD 4 CONC. POS.: 0 - 0  
STD 5 CONC. POS.: 0 - 0  
STD 6 CONC. POS.: 0 - 0  
SD LIMIT: 0.250  
DUPLICATE LIMIT: 100  
SENSITIVITY LIMIT: 0  
ABS LIMIT: 10000 - INC  
PROZONE LIMIT: 0  
EXPECTED VALUE: 0 - 96 (\*)  
PANIC VALUE: 2 - 1800 (\*)

X - X\* user def

NOTE: CNP-G3 method is not always available among calibrator values. If it fails, use PNP-G7 value or EPS, and program the parameters (\*) as indicated below:

EXPECTED VALUE: 10 - 220  
PANIC VALUE: 2 - 5000

**Analyzer: Hitachi 717**

Application: **AMYLASE EPS FL** - Codes EA F245 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	AMY
ASSAY CODE:	RATE-A - 32 - 48
SAMPLE VOL:	7
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	660 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	10 - 220
PANIC VALUE:	2 - 5000

X - X\* user def

**Analyzer: Hitachi 717**Application: **PANCREATIC ISOAMYLASE FL** - Code PA F245 CHPreparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B

Storage: REFRIGERATE AT 2-8°C

Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	AMYP
ASSAY CODE:	RATE-A - 32 - 48
SAMPLE VOL:	7
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	660 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	17 - 115
PANIC VALUE:	2 - 5000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **TOTAL BILIRUBIN** - Code BT 0360 CH  
Preparation: R1 - USE LIQUID READY TO USE REAGENT A  
R2 - MIX 30 PARTS OF REAGENT B1 WITH ONE PART OF REAGENT B2  
Storage: REFRIGERATE AT 2-8°C  
Stability: R1: AS INDICATED IN THE LABEL - R2: 7 DAYS.

**PROGRAM**

TEST:	BILT
ASSAY CODE:	2POINT - 20 - 50
SAMPLE VOL:	15
R1 VOLUME:	240
R2 VOLUME:	60
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0.1 - 1.2
PANIC VALUE:	0.0 - 20.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **DIRECT BILIRUBIN** - Code BD 0480 CH  
Preparation: R1 - USE LIQUID READY TO USE REAGENT A  
R2 - MIX 30 PARTS OF REAGENT A WITH ONE PART OF REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: R1: AS INDICATED IN THE LABEL - R2: 7 DAYS.

**PROGRAM**

TEST:	BILD
ASSAY CODE:	2POINT - 20 - 50
SAMPLE VOL:	15
R1 VOLUME:	240
R2 VOLUME:	60
WAVELENGTHS:	700 - 546
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0.0 - 0.2
PANIC VALUE:	0.0 - 20.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CALCIUM** - Code CA 0500 TC  
Preparation: R1 -INSTALL LIQUID READY TO USE REAGENT B  
R2 -INSTALL LIQUID READY TO USE REAGENT A  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST: CA  
ASSAY CODE: 1POINT - 50 - 0  
SAMPLE VOL: 3  
R1 VOLUME: 125  
R2 VOLUME: 125  
WAVELENGTHS: 700 - 570  
CALIB METHOD: 1 - 0  
STD 1 CONC. POS.: X - X\*  
STD 2 CONC. POS.: 0 - 0  
STD 3 CONC. POS.: 0 - 0  
STD 4 CONC. POS.: 0 - 0  
STD 5 CONC. POS.: 0 - 0  
STD 6 CONC. POS.: 0 - 0  
SD LIMIT: 0.250  
DUPLICATE LIMIT: 100  
SENSITIVITY LIMIT: 0  
ABS LIMIT: 0 - INC  
PROZONE LIMIT: 0  
EXPECTED VALUE: 9.2 - 11.0  
PANIC VALUE: 3.0 - 20.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CALCIUM ASX** - Code CA 0500 CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CA
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 660
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	9.2 - 11.0
PANIC VALUE:	3.0 - 20.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CHOLESTEROL FL** - Code CT F400 / 150F CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CHOL
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	140 - 200
PANIC VALUE:	70 - 750

X - X\* user def

**Analyzer: Hitachi 717**

Application: **HDL DIRECT FL**- Code HD F245 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
CALIBRATOR - RECONSTITUTE AS INDICATED IN INSERT SHEET  
Storage: REFRIGERATE AT 2-8°C  
Stability: 60 DAYS OPEN BOTTLES - CALIBRATOR: AS INDICATED IN INSERT SHEET

**PROGRAM**

TEST:	HDL
ASSAY CODE:	2POINT - 20 - 50
SAMPLE VOL:	3
R1 VOLUME:	252
R2 VOLUME:	84
WAVELENGTHS:	700 - 600
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	35 - 55
PANIC VALUE:	10 - 180

X - X\* user def

**Analyzer: Hitachi 717**Application: **CHOLINESTERASE FL (DGKC)** - Codes CH F245 / F400 CH

Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A

R2 - INSTALL LIQUID READY TO USE REAGENT B

Storage: REFRIGERATE AT 2-8°C

Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	HDL
ASSAY CODE:	RATE-A - 28 - 32
SAMPLE VOL:	6
R1 VOLUME:	200
R2 VOLUME:	40
WAVELENGTHS:	660 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	12000 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	5600 - 11200
PANIC VALUE:	1000 - 25000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CK-NAC FL** - Codes CK F120 / F245 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CKMB
ASSAY CODE:	RATE-A - 36 - 48
SAMPLE VOL:	8
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0 - 190
PANIC VALUE:	2 - 2500

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CK-MB FL** - Code MB F120 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CKMB
ASSAY CODE:	RATE-A - 36 - 48
SAMPLE VOL:	10
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0 - 24
PANIC VALUE:	2 - 2000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **COPPER** - Code CU 0100 CH  
Preparation: R1 - MIX REAGENT A + REAGENT B AS INDICATED IN INSERT SHEET  
Storage: REFRIGERATE AT 2-8°C  
Stability: 2 WEEKS

**PROGRAM**

TEST:	CU
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	12
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 570
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	80 - 140
PANIC VALUE:	3 - 500

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CREATININE** - Code CR 0500 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT B  
R2 - INSTALL LIQUID READY TO USE REAGENT A  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CREA
ASSAY CODE:	2POINT - 28 - 32
SAMPLE VOL:	10
R1 VOLUME:	125
R2 VOLUME:	125
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0.6 - 1.2
PANIC VALUE:	0.2 - 12.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **CREATININE ES FL** - Code CR F200 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	CREA
ASSAY CODE:	2POINT - 34 - 40
SAMPLE VOL:	10
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	0.6 - 1.2
PANIC VALUE:	0.2 - 18.0

X - X\* user def

**Analyzer: Hitachi 717**Application: **GAMMA-GT FL** - Codes GT F245 / F400 / F600 CHPreparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B

Storage: REFRIGERATE AT 2-8°C

Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	GGT
ASSAY CODE:	RATE-A - 35 - 48
SAMPLE VOL:	20
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	660 - 415
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	11 - 50
PANIC VALUE:	1 - 1000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **GLUCOSE FL** - Code GL F400 / 150F CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	GLUC
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	70 - 110
PANIC VALUE:	20 - 450

X - X\* user def

**Analyzer: Hitachi 717**

Application: **GLUCOSE UV FL** - Code GL F601 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	GLUC
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	60 - 110
PANIC VALUE:	20 - 800

X - X\* user def

**Analyzer: Hitachi 717**

Application: **GOT/AST FL** - Codes GO F245 / F400 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	GOT
ASSAY CODE:	RATE-A - 36 - 48
SAMPLE VOL:	20
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	5 - 40
PANIC VALUE:	1 - 700

X - X\* use def

**Analyzer: Hitachi 717**

Application: **GPT/ALT FL** - Codes GP F245 / F400 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	GPT
ASSAY CODE:	RATE-A - 36 - 48
SAMPLE VOL:	20
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	5 - 40
PANIC VALUE:	1 - 700

X - X\* user def

**Analyzer: Hitachi 717**

Application: **HBDH FL** - Codes HB F245 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	HBDH
ASSAY CODE:	RATE-A - 35 - 48
SAMPLE VOL:	3
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	96 - 190
PANIC VALUE:	20 - 4000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **IRON FZ** - Codes FE F245 / F400 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	FE
ASSAY CODE:	2POINT - 20 - 50
SAMPLE VOL:	20
R1 VOLUME:	240
R2 VOLUME:	60
WAVELENGTHS:	700 - 570
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	59 - 158
PANIC VALUE:	10 - 700

X - X\* user def

**Analyzer: Hitachi 717**

Application: **LDH FL** - Codes LD F120 / F245 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	LDH
ASSAY CODE:	RATE-A - 35 - 48
SAMPLE VOL:	3
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	10000 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	225 - 450
PANIC VALUE:	20 - 4000

X - X\* user def

**Analyzer: Hitachi 717**

**Application: LIPASE FL (next introduction)**

**PROGRAM**

**Analyzer: Hitachi 717**

Application: **MAGNESIUM** - Code MG 0200 / 0500 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT B  
R2 - INSTALL LIQUID READY TO USE REAGENT A  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	MG
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	125
R2 VOLUME:	125
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	1.3 - 2.1
PANIC VALUE:	0.5 - 8.5

X - X\* user def

**Analyzer: Hitachi 717**

Application: **PHOSPHORUS**- Code PH 0500 CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	PHOS
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	2.3 - 4.7
PANIC VALUE:	0.5 - 15.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **PROTEINS HS** - Code HS 0500 CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	HS
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	10
R1 VOLUME:	300
R2 VOLUME:	0
WAVELENGTHS:	700 - 600
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	28 - 141
PANIC VALUE:	3 - 500

X - X\* user def

**Analyzer: Hitachi 717**

Application: **TOTAL PROTEINS** - Codes TP 0500 / 1500 CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: ROOM TEMPERATURE OR REFRIGERATE (2-30°C)  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	TP
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 546
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	6.0 - 7.8
PANIC VALUE:	3.0 - 12.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **TRIGLYCERIDES FL** - Codes TR F400 / 150F CH  
Preparation: R1 - LIQUID READY TO USE SINGLE REAGENT  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	TRIG
ASSAY CODE:	1POINT - 50 - 0
SAMPLE VOL:	3
R1 VOLUME:	250
R2 VOLUME:	0
WAVELENGTHS:	700 - 505
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - INC
PROZONE LIMIT:	0
EXPECTED VALUE:	10 - 190
PANIC VALUE:	5 - 1000

X - X\* user def

**Analyzer: Hitachi 717**

Application: **UREA UV FL** - Codes AZ F245 / F400 / F600 CH  
Preparation: R1 - INSTALL LIQUID READY TO USE REAGENT A  
R2 - INSTALL LIQUID READY TO USE REAGENT B  
Storage: REFRIGERATE AT 2-8°C  
Stability: AS INDICATED IN THE LABEL

**PROGRAM**

TEST:	UREA
ASSAY CODE:	2POINT - 32 - 36
SAMPLE VOL:	3
R1 VOLUME:	200
R2 VOLUME:	50
WAVELENGTHS:	376 - 340
CALIB METHOD:	1 - 0
STD 1 CONC. POS.:	X - X*
STD 2 CONC. POS.:	0 - 0
STD 3 CONC. POS.:	0 - 0
STD 4 CONC. POS.:	0 - 0
STD 5 CONC. POS.:	0 - 0
STD 6 CONC. POS.:	0 - 0
SD LIMIT:	0.250
DUPLICATE LIMIT:	100
SENSITIVITY LIMIT:	0
ABS LIMIT:	0 - DEC
PROZONE LIMIT:	0
EXPECTED VALUE:	10 - 50
PANIC VALUE:	2 - 250

X - X\* user def

**Analyzer: Hitachi 717**

Application: **URIC ACID T FL** - Code AU F402 CH  
Preparation: R1 - MIX REAGENT A + REAGENT B AS INDICATED IN INSERT SHEET  
Storage: REFRIGERATE AT 2-8°C  
Stability: 90 DAYS

**PROGRAM**

TEST: UA  
ASSAY CODE: 1POINT - 50 - 0  
SAMPLE VOL: 5  
R1 VOLUME: 250  
R2 VOLUME: 0  
WAVELENGTHS: 700 - 546  
CALIB METHOD: 1 - 0  
STD 1 CONC. POS.: X - X\*  
STD 2 CONC. POS.: 0 - 0  
STD 3 CONC. POS.: 0 - 0  
STD 4 CONC. POS.: 0 - 0  
STD 5 CONC. POS.: 0 - 0  
STD 6 CONC. POS.: 0 - 0  
SD LIMIT: 0.250  
DUPLICATE LIMIT: 100  
SENSITIVITY LIMIT: 0  
ABS LIMIT: 0 - INC  
PROZONE LIMIT: 0  
EXPECTED VALUE: 3.5 - 7.7  
PANIC VALUE: 1.0 - 20.0

X - X\* user def

**Analyzer: Hitachi 717**

Application: **ZINC** - Code ZN 0125 CH  
Preparation: R1 - MIX REAGENT A + REAGENT B AS INDICATED IN INSERT SHEET  
Storage: REFRIGERATE AT 2-8°C  
Stability: 2 SWEEEKS

**PROGRAM**

TEST: ZN  
ASSAY CODE: 1POINT - 50 - 0  
SAMPLE VOL: 12  
R1 VOLUME: 250  
R2 VOLUME: 0  
WAVELENGTHS: 700 - 570  
CALIB METHOD: 1 - 0  
STD 1 CONC. POS.: X - X\*  
STD 2 CONC. POS.: 0 - 0  
STD 3 CONC. POS.: 0 - 0  
STD 4 CONC. POS.: 0 - 0  
STD 5 CONC. POS.: 0 - 0  
STD 6 CONC. POS.: 0 - 0  
SD LIMIT: 0.250  
DUPLICATE LIMIT: 100  
SENSITIVITY LIMIT: 0  
ABS LIMIT: 0 - INC  
PROZONE LIMIT: 0  
EXPECTED VALUE: 70 - 115  
PANIC VALUE: 3 - 500

X - X\* user def