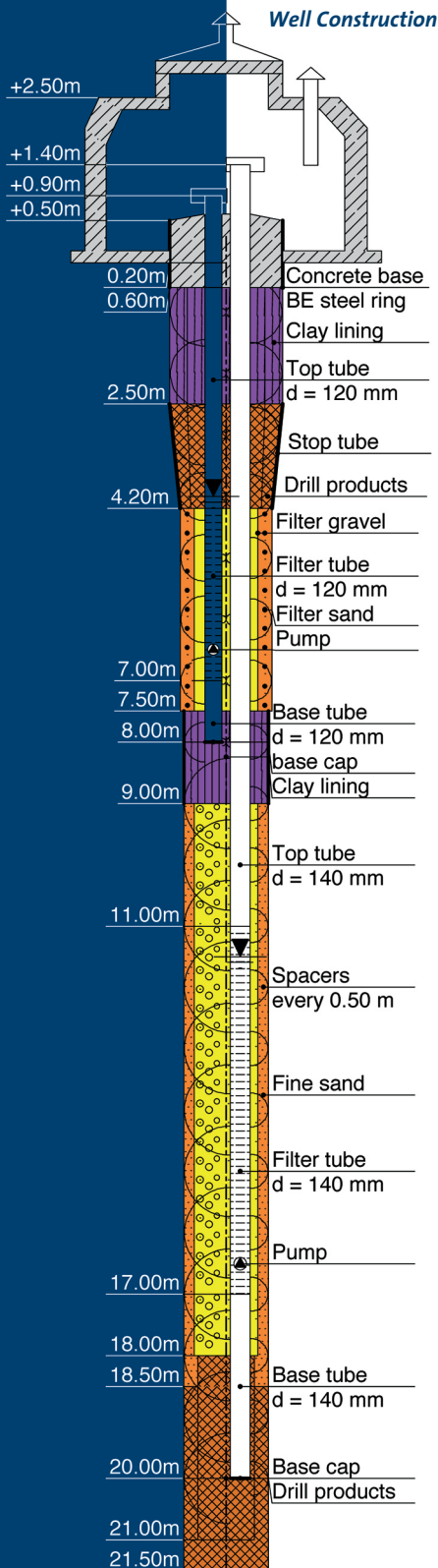


Bore hole logs, Layer specifications Well and gauge sinking DCBORE

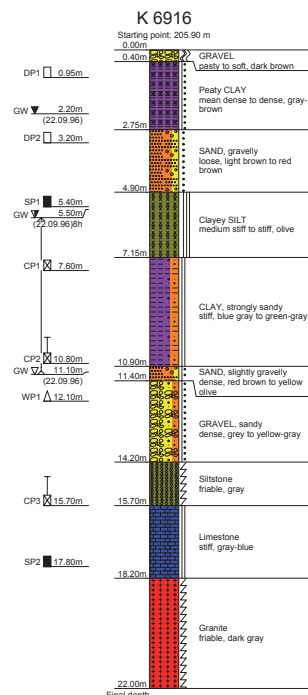


- Bore profiles acc. to DIN 4023:2006, DIN EN ISO 14688-1, OENORM B 4400-1, SN 640 034 and 670 008, British Standard BS 5930
- Layer specification acc. to DIN EN 22 475-1, DIN 4022 and DIN 4943
- Well and piezometer display acc. to DIN 4943
- German, English, French, Romanian language
- Geothermal borings with sounding cone and colored pipes

Functions

Bore hole logs:

- Layer input through short designations, immediate conversion into long text
- Free completion of the layer descriptions
- Samples and water levels (different types), soil group and soil class



Bore profile

DC-Software GmbH Hannah-Arendt-Weg 3 D-80997 München Tel. +49-89-899 048-33 Fax: 18		Enclosure 1.2 Report: 87-23 File no.:	
Layer specification for borings without continuous sampling of cored probes			
Project: Demo project		Page 3	
boring no. K 6916		Date:	
1	2	3	4
To	From	Comments	Sampled Probes
a) Soil type name and structures	b) Additional notes	Special probes Water bearing Drills Core loss Other	Type No.
c) Quality by cuttings	d) Quality by bore process	e) Color	Depth in m (lower edge)
f) Literal name	g) Geological name	h) Group	i) Line content
0.40	a) GRAVEL b) c) pasty to soft d) e) dark brown f) g) h) i)		
2.75	a) Peaty CLAY b) c) mean dense to dense d) e) gray-brown f) g) h) i)	water at rest 22.09.96	DP 1 0.95
4.90	a) SAND, gravelly b) c) loose d) e) light brown to red brown f) g) h) SW i)		DP
7.15	a) Clayey SILT b) c) medium stiff to stiff d) e) olive f) g) h) UA i)	water rise 5.50m b. AP 22.09.96	SP
10.90	a) CLAY, strongly sandy b) c) stiff d) e) blue gray to green-gray f) g) h) TM i)		CP CP

Layer specification

- Complete symbol editor to define and modify all soil types, abbreviations and colors
- Layer specification: user-defined selection of font and font style (bold, italic), predefined texts with right mouse button

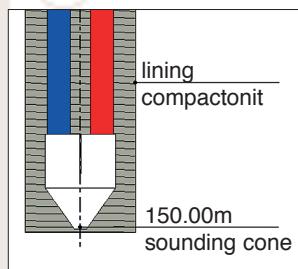
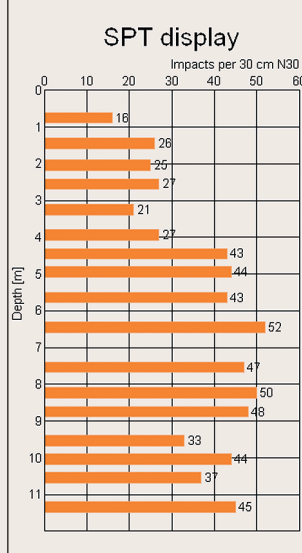
Level and well finish:

- Detailed graphic of level-head and/or well pit
- Any number of pipes (multi-level)
- All kinds of pipe types (extension pipe, different types of filter pipes, sump pipe, gauge pipe) incl. haunches
- User-defined fillings with symbol editor, any number of multi-fillings (counter filter), with block pipe or continuous sealing
- Spacers: different types

- Infill baskets, infill pipes, cementation items, packers
- Automatic labeling, optionally user-defined labeling

Operation

- Immediate graphical control of all input with zoom-function
- Most simple edit process by double-click in the graphic
- Extensive configuration options: abbreviations, long text, color, consistency, soil group, soil class, samples/water levels on/off, elevations etc.
- All kinds of page formats up to A0, customizable definition of the title block



Standard penetration test acc. to EN ISO 22 476-3 and DIN 4094-2

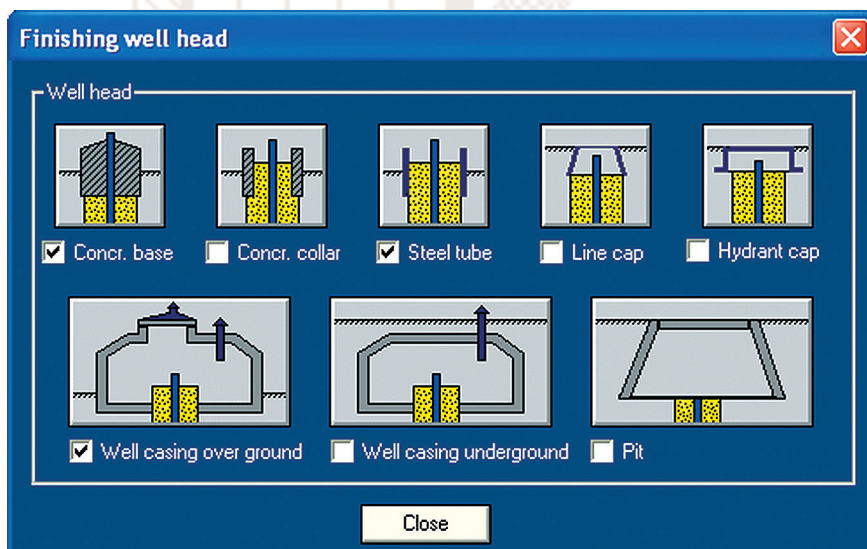
K 6912
Heat extraction
acc. to guideline VDI 4640
for 1800 annual operation hours, water level = 19.85 m

No.	Soil type	Layer name	Thickness [m]	Spec. heat extraction[W/m]	Heat extraction[W]
1	CLAYEY PEAT	Clayey PEAT	0.40	25.0	10.0
2	GRAVEL	GRAVEL	2.35	25.0	58.8
3	SANDY SILT	Sandy SILT	11.80	35.0	408.0
4	SILTY CLAY	Silty CLAY	4.15	35.0	145.3
5	SILTY SAND	Silty SAND	4.95	25.0 / 65.0 *	267.8
6	GRAVEL	GRAVEL	7.75	65.0	503.8
7	SAND	SAND	8.35	65.0	542.8
8	GRAVEL	GRAVEL	8.75	65.0	568.8
9	SAND	SAND	13.70	65.0	890.5
Total			62.00		3393.5

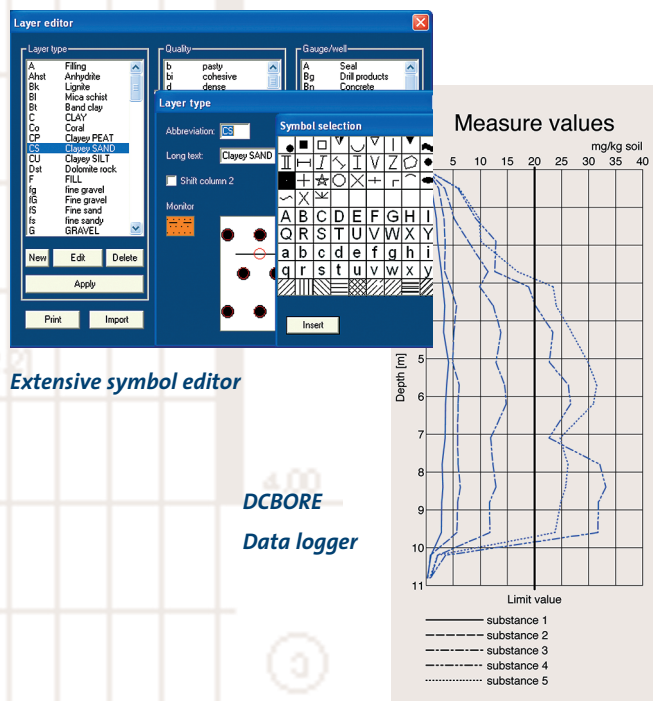
* values above / below ground water

Determination of the heat extraction with DCBORE-Geotherm

Display of geothermal boring



Level and well heads



Extensive symbol editor

DCBORE Data logger

- Project-related database storage: access via Microsoft Access possible
- Graphics export to DXF format (AutoCAD)

Additional options

- DCBORE-Geotherm: Determination of the heat extraction acc. to VDI guideline 4640 directly from the bore profile
- DCSTAN: BDPs (SPT: Standard Penetration Test acc. to DIN 4094-2, EN ISO 22476-3)
- DCBORE-Data logger: measure values in a diagram along with the bore profile: lines/bars, linear/logarithmic
- DCBORE-LS2: Layer specification according to DIN 4022 Part 2 (borings in rock)
- DCBORE-LS3: Layer specification according to DIN 4022 Part 3 (taking cored samples)
- DCBORE-SEP: Import and export of bore data in SEP format
- DCBORE-ProfilTec: Import from GeoLogik ProfilTec Feldbuch