33. Financial risk management objectives and policies

Financial Risk Factors

The Group, by nature of its business and geographical positioning, is exposed to financial risks. The Group's overall financial risk is managed by Group Finance and Treasury units, aiming to minimize the potential unfavorable impact arising from the markets' fluctuations on Group's financial performance. The Group does not engage in speculative transactions or transactions which are not related to its commercial, investing or borrowing activities.

a) Liquidity risk

The Group, in addition to its operating cash flows, maintains sufficient cash and other liquid assets, as well as extensive committed credit lines with several international banks to ensure the fulfilment of its financial obligations. Group Treasury controls Group funding as well as the management of liquid assets.

The table below summarizes the maturity profile of financial liabilities at 31 December 2016 and 2015 based on contractual undiscounted payments.

(all amounts in Euro thousands)

Group	Year ended 31 December 2016					
	Less than 1 month	1 to 6 months	6 to 12 months	1 to 5 years	>5years	Total
Borrowings	100,579	36,979	20,891	848,027	31,172	1,037,648
Other non-current liabilities	-	-	-	1,262	-	1,262
Trade and other payables	162,378	63,798	4,276	-	-	230,452
	262,957	100,777	25,167	849,289	31,172	1,269,362
	Year ended 31 December 2015					
Borrowings	29,097	5,545	22,100	794,435	20,182	871,359
Derivative financial instruments (non-current)	-	-	-	924	-	924
Other non-current liabilities	-	-	-	1,505	8	1,513
Trade and other payables	165,416	62,554	4,937	-	-	232,907
	194,513	68,099	27,037	796,864	20,190	1,106,703

Company	Year ended 31 December 2016					
	Less than 1 month	1 to 6 months	6 to 12 months	1 to 5 years	>5years	Total
Borrowings	46,881	3,340	5,846	341,721	-	397,788
Other non-current liabilities	-	-	-	142	-	142
Trade and other payables	25,484	9,197		-	-	34,681
	72,365	12,537	5,846	341,863	-	432,611
	Year ended 31 December 2015					
Borrowings	16,267	1,472	8,355	325,945	-	352,039
Other non-current liabilities	-	-	-	138	8	146
Trade and other payables	28,264	6,139	156	-	-	34,559
	44,531	7,611	8,511	326,083	8	386,744

Borrowings include the floating and fixed rate outstanding principal at year-end plus accrued interest up to maturity.

The amounts that are described as "less than 1 month" are as usual on demand short-term uncommitted facilities plus interest accruals, and also including the €87.9 million outstanding Notes due 19 January 2017 plus coupon payments.

b) Market risk

Market risk comprises three main types of risk: currency risk, price risk, such as commodity risk and interest rate risk.

Group exposure to exchange rate (FX) risk derives from existing or expected cash flows denominated in currencies other than the Euro (imports / exports) and from international investments.

FX risks are managed using natural hedges, FX derivatives / swaps and FX forwards. Borrowings denominated in the same currency as the assets that are being financed and these create a natural hedge for investments in foreign subsidiaries exposed to FX conversion risk.

However, part of the financing of Group activities in the USA, Egypt and Albania, is in different currencies (Euro) than their functional ones. Their refinancing in local currencies along with fx hedging transactions are examined at regular intervals.

33. Financial risk management objectives and policies (continued)

In July 2014, Titan America LLC (TALLC) borrowed €177 million with five year maturity and fixed interest rate from Titan Global Finance PLC (TGF) (use of proceeds of the €300 million bond due July 2019) and entered into cross currency interest rate swap agreements (CCS) with two financial institutions, essentially converting the fixed rate Euro-loan to a US dollar-floating rate based on 6-month LIBOR loan. The transactions were undertaken in order to hedge the foreign currency risk (€/$) on both the notional amount and the interest payments associated with the Euro denominated borrowing.

TALLC in July 2016 entered into interest rate swap agreements (IRS) with two financial institutions, essentially converting the US dollar-6 month LIBOR floating rate loan to a US dollar fixed rate loan. The transactions were undertaken in order to hedge the fluctuation of the US dollar-6 month LIBOR interest rate payments. In conclusion, the terms of the CCS and the IRS agreements result to the conversion of the fixed rate Euro-loan to a US dollar fixed rate loan with effective date 10 January 2017. As at 31 December 2016, the total exposure (mark to market valuation and CSA agreement) of both derivatives was recorded as an asset of €1,386 thousand (31.12.2015: liability amounted to €764 thousand) in the statement of financial position.

TALLC in August 2015 entered into oil swap agreement, essentially converting the floating prices of the US oil to fixed oil prices on a monthly basis and up to December 2016, with termination date 9 January 2017. This transaction was undertaken in order to hedge the flactuation of oil prices on US diesel payments. As at 31 December 2016, the mark to market valuation of the oil swap was recorded as an asset of €1 thousand (31.12.2015: liability amounted to €160 thousand) in the statement of financial position.

Sensitivity analysis in foreign exchange rate changes

The following table demonstrates the sensitivity of the Group's profit before tax and the Group's equity to reasonable changes in the USA Dollar, Serbian Dinar, Egyptian Pound, British Pound, Turkish Lira, Albanian Lek and Brazilian Real floating exchange rates, with all other variables held constant:

(all amounts in Euro thousands)	Foreign Currency	Increase/ Decrease of Foreign Currency vs. €	Effect on Profit Before Tax	Effect on equity
Year ended 31 December 2016	USD	5%	3,517	33,082
		-5%	-3,182	-29,932
	RSD	5%	610	1,647
		-5%	-552	-1,491
	EGP	5%	-1,130	14,674
		-5%	1,023	-13,276
	GBP	5%	86	204
		-5%	-78	-184
	TRY	5%	204	1,973
		-5%	-185	-1,785
	ALL	5%	3	2,333
		-5%	-3	-2,111
	BRL	5%	-152	6,006
		-5%	138	-5,434
Year ended 31 December 2015	USD	5%	1,084	24,633
		-5%	-981	-22,287
	RSD	5%	485	1,558
		-5%	-439	-1,410
	EGP	5%	-1,609	37,263
		-5%	1,456	-33,715
	GBP	5%	97	475
		-5%	-88	-430
	TRY	5%	274	1,357
		-5%	-248	-1,227
	ALL	5%	166	2,306
		-5%	-151	-2,086

Note: Calculation of "Effect on Profit before tax" is based on year average FX rates; calculation of "Effect on Equity" is based on year end FX rate changes.

33. Financial risk management objectives and policies (continued)

The ratio of fixed to floating rates of the Group's net borrowings is determined by market conditions, Group strategy and financing requirements. Occasionally interest rate derivatives may be used to mitigate the relevant risk and balance the mix of fixed and floating rates of the Group's borrowings.

On 31 December 2016, following the issuance of €300 million notes, by which part of existing fixed rate notes of 8.75% coupon rate were refinanced prior their maturity, the Group's ratio of fixed to floating interest rates, taking into account outstanding cross currency swaps, stood at 62%/38% (31 December 2015: 43%/57%).

The impact of interest rate volatility is limited in the income statement and cash flow from operating activities of the Group, as shown in the sensitivity analysis table below:

Sensitivity analysis of Group's borrowings due to interest rate changes

(all amounts in Euro thousands)		Interest rate variation (+/-)	Effect on profit before tax (-/+)
Year ended 31 December 2016	EUR	1.0%	187
	USD	1.0%	2,487
	BGN	1.0%	156
	EGP	1.0%	630
	ALL	1.0%	309
	TRY	1.0%	19
Year ended 31 December 2015	EUR	1.0%	512
	USD	1.0%	2,412
	BGN	1.0%	117
	EGP	1.0%	1,342
	ALL	1.0%	366

Note: Table above excludes the positive impact of interest received from deposits.

Interest rate trends and the duration of the Group's financing needs are monitored on a forward looking basis. Consequently, decisions about the duration and the mix between fixed and floating rate debt are taken on an ad-hoc basis.

c) Credit Risk

The Group has no significant concentrations of credit risk. Trade accounts receivable consist mainly of a large, widespread customer base. All Group companies monitor the financial position of their debtors on an on-going basis.

When considered necessary, additional collateral is requested to secure credit. Provisions for impairment losses are made for special credit risks. As at 31 December 2016, there are no outstanding doubtful significant credit risks which are not already covered by a provision for doubtful receivables.

Credit risk arising from financial institutions' inability to meet their obligations towards the Group deriving from placements, investments and derivatives, is mitigated by pre-set limits on the degree of exposure to each individual financial institution. These pre-set limits are set in accordance to the Group Treasury policies. At 31 December 2016, the Group's majority financial assets and derivative financial instruments were held with investment grade financial institutions.

On 31 December 2016, the Group's cash and cash equivalents were held at time deposits and current accounts. Note 21 includes an analysis on cash and cash equivalents.

33. Financial risk management objectives and policies (continued)

d) Capital management

The primary objective of the Group's capital management is to ensure that it maintains healthy capital ratios in order to support its operations and maximize shareholder value.

The Group manages its capital structure conservatively with the leverage ratio, as this is shown from the relationship between total liabilities and total equity as well as net debt and profit before interest, taxes, depreciation, amortization and impairment.

Titan's policy is to maintain leverage ratios in line with an investment grade profile.

The Group includes within net debt, interest bearing loans and borrowings, less cash and cash equivalents.

(all amounts in Euro thousands)	Group		Company	
	2016	**2015**	**2016**	**2015**
Long term borrowings (note 24)	710,965	716,766	310,678	300,712
Short term borrowings (note 24)	129,499	26,313	42,442	9,324
Debt	**840,464**	**743,079**	**353,120**	**310,036**
Less: cash and cash equivalents (note 21)	179,710	121,733	11,218	8,626
Net Debt	**660,754**	**621,346**	**341,902**	**301,410**
Profit before interest, taxes, depreciation, amortization and impairment.	**278,599**	**216,422**	**30,086**	**43,768**
Total liabilities	**1,236,961**	**1,243,462**	**439,968**	**387,754**
Total equity	**1,552,816**	**1,705,285**	**827,269**	**860,544**