



The Pakistan Credit Rating Agency Limited

## Rating Report

### Nagina Cotton Mills Limited

#### Report Contents

1. Rating Analysis
2. Financial Information
3. Rating Scale
4. Regulatory and Supplementary Disclosure

#### Rating History

Dissemination Date	Long Term Rating	Short Term Rating	Outlook	Action	Rating Watch
23-Sep-2022	A-	A2	Stable	Maintain	-
24-Sep-2021	A-	A2	Stable	Maintain	-
25-Sep-2020	A-	A2	Stable	Maintain	-
28-Sep-2019	A-	A2	Stable	Maintain	-
30-Mar-2019	A-	A2	Stable	Maintain	-
23-Nov-2018	A-	A2	Stable	Initial	-

#### Rating Rationale and Key Rating Drivers

Nagina Cotton Mills Limited, incorporated in 1967 as a public limited company, is the flagship company of one of the oldest medium-sized textile groups in Pakistan - Nagina Group. The group has a presence in the local spinning and weaving sector through Ellcot Spinning Mills Limited and Prosperity Weaving Mills Limited. Nagina Cotton is engaged in the production of export-quality yarn and operates with a spinning unit comprising 51,708 spindles. The ratings reflect Nagina Cotton's good business profile. During 9MFY22, the Company's revenue increased by 59% YoY to stand at PKR 8.1bln mainly due to a significant increase in local sales; export sales inched up during the period. This trend is in line with the industry due to enhanced margins in the local market. During the period, margins have improved along with an increased net income of PKR 1,158mln. Improved profitability has strengthened the cashflows and coverages. Moreover, the Company's reliance on short-term borrowings has increased significantly. However, the Company has a modest leveraged capital structure. The financial risk matrix of the company has shown improvement over the years. The assigned ratings derive comfort from Nagina Cotton's association with the Nagina Group. During FY22, Pakistan's textile exports surged to \$19.3bln (recording a growth of 26%). Exports grew owing to increased volumetric growth of (16% YoY) in the value-added segment, a steep rise in global demand, and record high cotton prices. Under the value-added category, the knitwear segment remained the top performer by posting 34% YoY growth in exports to \$5.1 billion in FY22 due to a sharp rise in global demand, especially in the US and European countries. Other value-added segments such as ready-made garments, bed wear, and towel posted YoY growth of 29%, 19%, and 19% to \$3.9 billion, \$3.3 billion, and \$1.1 billion respectively. However, a slowdown is expected in textile demand amid burgeoning inflationary pressures in the exporting destinations, especially in the US and European countries.

The ratings are dependent on the Company's ability to generate sufficient cash flows to fulfill its financial obligations while sustaining profitability. At the same time, prudent management of the investment portfolio is also critical. The equity base of the company is satisfactory and should be beefed up, going forward.

#### Disclosure

<b>Name of Rated Entity</b>	Nagina Cotton Mills Limited
<b>Type of Relationship</b>	Solicited
<b>Purpose of the Rating</b>	Entity Rating
<b>Applicable Criteria</b>	Methodology   Corporate Rating(Jun-22),Methodology   Correlation Between Long-term & Short-term Rating Scales(Jun-22),Methodology   Rating Modifiers(Jun-22)
<b>Related Research</b>	Sector Study   Spinning(Sep-21)
<b>Rating Analysts</b>	Sehar Fatima   sehar.fatima@pacra.com   +92-42-35869504

## Profile

**Legal Structure** Nagina Cotton Mills Limited (Nagina Cotton) was incorporated in 1967 as a public limited company.

**Background** Nagina Cotton is the pioneer company of Nagina Group. Over the period the Group has managed to grow from a single Spinning company to multiple spinning entities and a weaving company. The Company's manufacturing facility is located in Kotri Industrial Trading Estate, Sindh.

**Operations** Nagina Cotton's current operational capacity comprises 51,708 spindles, operating at the full capacity. The total energy requirement of the Company is ~6.4MW which is wholly met through internal power generation. Furthermore, the Company has a K-electric connection as backup.

## Ownership

**Ownership Structure** Nagina Cotton is majorly (~91%) owned by Nagina Group, through group companies and sponsoring individuals. The remaining stake of the Company rests with financial institutions and general public.

**Stability** The considerable positions in Nagina Group are held by Ellahi Family. The Group has a structured line of succession. However the transfer of ownership to the next generation is yet to be seen. Meanwhile, third generation is already in business, serving at various positions.

**Business Acumen** Nagina Group is one of the oldest medium-sized textile houses in Pakistan. Operating under Ellahi's for five decades, developing credential expertise in spinning and weaving over the period of time. The Group has adequately expanded its capacities despite competitive textile industry.

**Financial Strength** Nagina Group comprises three listed public limited companies, namely; i) Ellcot Spinning Mills, ii) Prosperity Weaving Mills, and iii) Nagina Cotton Mills Limited and six private limited companies. Nagina Group's private limited companies include Monell (Pvt.) Limited, Icaro (Pvt.) Limited, Haroon Omer (Pvt.) Limited, Ellahi International (Pvt.) Limited, ARH (Pvt.) Limited, and Pacific Industries (Pvt.) Limited.

## Governance

**Board Structure** Nagina Cotton's board constitutes ten members out of which five are non-executive, two occupy executive roles – including the CEO, while three directors are independent.

**Members' Profile** Mr. Shahzada Ellahi Shaikh – the Chairman – holds a bachelor's degree in Economics and International Relations. The board member carries vast knowledge and extensive experience of textile industry, though diversity in experiences also exists.

**Board Effectiveness** Three committees: Audit, Executive and Human Resource & Remuneration, are in place to assist the board in relevant matters and ensure proper oversight.

**Financial Transparency** M/s. Yousuf Adil, Chartered Accountants are the external auditors of the Company. They have expressed unqualified opinion on the financial statements of the Company for FY21; whereas audit of financial statements for FY22 is underway.

## Management

**Organizational Structure** Management control vests with Ellahi Family with defined reporting line to ensure smooth operations and excellence. The Company's organizational structure is broadly divided into seven functional departments: (i) Marketing, (ii) Finance, (iii) Accounts, (iv) Administration & Corporate, (v) Commercial (fixed asset procurement), (vi) Export, and (vii) Internal Audit.

**Management Team** The management team is headed by the CEO, Mr. Amin Ellahi who holds a graduate degree. He is supported by a team of seasoned professionals, supplementing his expertise. Mr. Shaukat Ellahi is the Executive Director. He associated with Nagina Cotton since its inception, he is well verse with the textile business and has strong business acumen.

**Effectiveness** The management meetings are held on daily basis with follow-up points to resolve or pro-actively address operational issues, if any, eventually ensuring smooth flow of operations. The Company's MIS can be classified into three categories on the basis of periodicity – Daily, Weekly and Monthly.

**MIS** Nagina Cotton, partnering with A.F. Ferguson implemented an Oracle-based ERP solution – Oracle E-Business Suite 12.1.3 – with five operational modules including i) Order management, ii) Procurement, iii) Inventory, iv) Fixed Assets, and v) Cash management.

**Control Environment** Nagina Cotton is accredited with multiple certifications for compliance and quality assurance, namely; ISO 9001:2008, Standard 100 by OEKOTEX, Global Organic Textile Standards (GOTS), Organic Content Standard, Organic Content Standard 100, and Organic Content Standard Blended.

## Business Risk

**Industry Dynamics** During FY22, Pakistan's textile exports surged to \$19.3bln (recording a growth of 26%). Exports grew owing to increased volumetric growth of (16% YoY) in the value-added segment, a steep rise in global demand, and record high cotton prices. Under the value-added category, the knitwear segment remained the top performer by posting 34% YoY growth in exports to \$5.1 billion in FY22 due to a sharp rise in global demand, especially in the US and European countries. Other value-added segments such as ready-made garments, bed wear, and towel posted YoY growth of 29%, 19%, and 19% to \$3.9 billion, \$3.3 billion, and \$1.1 billion respectively. However, a slowdown is expected in textile demand amid burgeoning inflationary pressures in the exporting destinations, especially in the US and European countries.

**Relative Position** Nagina Group has a long operating history in Pakistan and has developed prominent position in local spinning industry. Currently, the Group's spinning capacity stands at 114,108 spindles which strengthens Nagina Cotton's market position. However, on standalone basis, Nagina Cotton's share in local spinning industry is minimal.

**Revenues** During 9MFY22, the company's revenue increased by 58.8% YoY to stand at PKR 8,115mln (9MFY21: PKR 5,110mln) owing to better yarn prices in international market. Over the years, sales mix changed significantly with export sales dominating the revenue (9MFY22: 96%; 9MFY21: 82%). The company determines its sales mix based on availability of better prices in local market and international market, to achieve optimal profitability.

**Margins** During 9MFY22, the company's gross margins increased to 18.9% (9MFY21: 17%). This translated into strengthened operating margins clocking in at 18.9% (9MFY20: 12.6%). Finance cost increased to stand at PKR 182mln (9MFY21: PKR 130mln). Net income increased significantly to stand at PKR 1,158mln (9MFY21: PKR 487mln) owing to strengthened topline. Subsequently, net margin increased (9MFY22: 14.3%, 9MFY21: 9.5%).

**Sustainability** The management of the company is focusing on efficient sales mix and product differentiation strategy along with consistent monitoring of areas where measures can be taken to reduce cost and enhance the value of the company through profitably and market growth. Moving forward, situation of uncertainty prevails in international market. The BMR/ expansion program of the company is continuing at a steady pace and will be done in two phases. In first phase, 10,800 spindles have been installed at the mills and has started production. In second phase, 10,800 spindles are expected to be installed in the first half of next calendar year. Furthermore, NCML is in the process of installing 999 kw solar energy project at the mills.

## Financial Risk

**Working Capital** At end Mar22, the company's net working capital cycle shortened to 107 days (FY21: 125 days), mainly on account of lower inventory days (9MFY22: 73 days; FY21: 98 days). Trade assets of the company increased (9MFY22: PKR 5,209mln; FY21: PKR 2,270mln) majorly due to higher inventory level (9MFY22: PKR 3,036mln; FY21: PKR 1,305mln) further augmented by higher receivable levels (9MFY22: PKR 1,402mln; FY21: PKR 733mln). ST trade leverage adequacy declined (9MFY22: 76%; FY21: 90%) owing to higher STB.

**Coverages** During 9MFY22, the company experienced an increase in operating cash flows clocking in at PKR 1,576mln (9MFY21: PKR 869mln) owing to improved profitability at operating level. Finance cost increased (9MFY21: PKR 182mln, 9MFY21: PKR 130mln). Interest coverage increased owing to improved FCFO (9MFY22: PKR 9.1x; 9MFY21: PKR 6.7x). Likewise, debt coverage also increased (9MFY22: PKR 3.5x; 9MFY21: PKR 2.8x).

**Capitalization** At end Mar22, the company's leverage increased to 55.3% (FY21: 48.7%) as the total borrowings increased (9MFY22: PKR 4,574mln; FY21: PKR 2,435mln), out of the total borrowing, short term debt constitutes 25% whereas 65% was borrowed at SBP's concessionary rates. The equity base of the company increased to stand at PKR 3,692mln (FY21: PKR 2,568mln).



The Pakistan Credit Rating Agency Limited

Financial Summary

PKR mln

Nagina Cotton Mills Limited Textile   Spinning	Mar-22 9M	Jun-21 12M	Jun-20 12M	Jun-19 12M
<b>A BALANCE SHEET</b>				
1 Non-Current Assets	4,071	2,753	2,960	2,022
2 Investments	236	1,053	401	474
3 Related Party Exposure	-	-	-	-
4 Current Assets	5,638	2,583	3,563	3,321
<i>a Inventories</i>	3,036	1,305	2,562	1,200
<i>b Trade Receivables</i>	1,402	733	555	1,636
5 Total Assets	9,944	6,390	6,924	5,817
6 Current Liabilities	1,391	1,112	1,119	1,052
<i>a Trade Payables</i>	88	73	171	70
7 Borrowings	4,574	2,435	3,800	2,622
8 Related Party Exposure	-	-	-	-
9 Non-Current Liabilities	287	274	125	119
10 Net Assets	3,692	2,568	1,880	2,024
11 Shareholders' Equity	3,692	2,568	1,880	2,024
<b>B INCOME STATEMENT</b>				
1 Sales	8,115	7,185	7,070	6,932
<i>a Cost of Good Sold</i>	(6,308)	(5,765)	(6,476)	(6,100)
2 Gross Profit	1,807	1,419	594	832
<i>a Operating Expenses</i>	(276)	(251)	(286)	(267)
3 Operating Profit	1,531	1,168	308	566
<i>a Non Operating Income or (Expense)</i>	(45)	(24)	70	9
4 Profit or (Loss) before Interest and Tax	1,486	1,144	378	575
<i>a Total Finance Cost</i>	(182)	(156)	(278)	(213)
<i>b Taxation</i>	(146)	(245)	(93)	(53)
6 Net Income Or (Loss)	1,158	743	8	309
<b>C CASH FLOW STATEMENT</b>				
<i>a Free Cash Flows from Operations (FCFO)</i>	1,576	1,410	449	614
<i>b Net Cash from Operating Activities before Working Capital Changes</i>	1,445	1,211	181	486
<i>c Changes in Working Capital</i>	(2,908)	1,029	(307)	(391)
1 Net Cash provided by Operating Activities	(1,463)	2,239	(127)	95
2 Net Cash (Used in) or Available From Investing Activities	(662)	(590)	(1,070)	(843)
3 Net Cash (Used in) or Available From Financing Activities	1,632	(939)	1,087	379
4 Net Cash generated or (Used) during the period	(494)	710	(110)	(369)
<b>D RATIO ANALYSIS</b>				
1 Performance				
<i>a Sales Growth (for the period)</i>	50.6%	1.6%	2.0%	17.9%
<i>b Gross Profit Margin</i>	22.3%	19.8%	8.4%	12.0%
<i>c Net Profit Margin</i>	14.3%	10.3%	0.1%	4.5%
<i>d Cash Conversion Efficiency (FCFO adjusted for Working Capital/Sales)</i>	-16.4%	33.9%	2.0%	3.2%
<i>e Return on Equity [ Net Profit Margin * Asset Turnover * (Total Assets/Shareholders' Equity) ]</i>	49.3%	33.4%	0.4%	15.9%
2 Working Capital Management				
<i>a Gross Working Capital (Average Days)</i>	109	131	154	132
<i>b Net Working Capital (Average Days)</i>	107	125	147	129
<i>c Current Ratio (Current Assets / Current Liabilities)</i>	4.1	2.3	3.2	3.2
3 Coverages				
<i>a EBITDA / Finance Cost</i>	9.8	9.6	2.1	3.6
<i>b FCFO / Finance Cost+CMLTB+Excess STB</i>	3.5	3.2	1.4	1.7
<i>c Debt Payback (Total Borrowings+Excess STB) / (FCFO-Finance Cost)</i>	1.8	1.8	12.2	2.9
4 Capital Structure				
<i>a Total Borrowings / (Total Borrowings+Shareholders' Equity)</i>	55.3%	48.7%	66.9%	56.4%
<i>b Interest or Markup Payable (Days)</i>	107.2	43.4	85.2	93.4
<i>c Entity Average Borrowing Rate</i>	6.4%	4.8%	7.8%	8.3%

**Credit Rating**

Credit rating reflects forward-looking opinion on credit worthiness of underlying entity or instrument; more specifically it covers relative ability to honor financial obligations. The primary factor being captured on the rating scale is relative likelihood of default.

Scale	Long-term Rating Definition
AAA	<b>Highest credit quality.</b> Lowest expectation of credit risk. Indicate exceptionally strong capacity for timely payment of financial commitments
AA+	
AA	<b>Very high credit quality.</b> Very low expectation of credit risk. Indicate very strong capacity for timely payment of financial commitments. This capacity is not significantly vulnerable to foreseeable events.
AA-	
A+	
A	<b>High credit quality.</b> Low expectation of credit risk. The capacity for timely payment of financial commitments is considered strong. This capacity may, nevertheless, be vulnerable to changes in circumstances or in economic conditions.
A-	
BBB+	
BBB	<b>Good credit quality.</b> Currently a low expectation of credit risk. The capacity for timely payment of financial commitments is considered adequate, but adverse changes in circumstances and in economic conditions are more likely to impair this capacity.
BBB-	
BB+	<b>Moderate risk.</b> Possibility of credit risk developing. There is a possibility of credit risk developing, particularly as a result of adverse economic or business changes over time; however, business or financial alternatives may be available to allow financial commitments to be met.
BB	
BB-	
B+	
B	<b>High credit risk.</b> A limited margin of safety remains against credit risk. Financial commitments are currently being met; however, capacity for continued payment is contingent upon a sustained, favorable business and economic environment.
B-	
CCC	<b>Very high credit risk.</b> Substantial credit risk “CCC” Default is a real possibility. Capacity for meeting financial commitments is solely reliant upon sustained, favorable business or economic developments. “CC” Rating indicates that default of some kind appears probable. “C” Ratings signal imminent default.
CC	
C	
D	Obligations are currently in default.

Scale	Short-term Rating Definition
A1+	The highest capacity for timely repayment.
A1	A strong capacity for timely repayment.
A2	A satisfactory capacity for timely repayment. This may be susceptible to adverse changes in business, economic, or financial conditions.
A3	An adequate capacity for timely repayment. Such capacity is susceptible to adverse changes in business, economic, or financial conditions.
A4	The capacity for timely repayment is more susceptible to adverse changes in business, economic, or financial conditions. Liquidity may not be sufficient.



\*The correlation shown is indicative and, in certain cases, may not hold.

**Outlook (Stable, Positive, Negative, Developing)** Indicates the potential and direction of a rating over the intermediate term in response to trends in economic and/or fundamental business/financial conditions. It is not necessarily a precursor to a rating change. ‘Stable’ outlook means a rating is not likely to change. ‘Positive’ means it may be raised. ‘Negative’ means it may be lowered. Where the trends have conflicting elements, the outlook may be described as ‘Developing’.

**Rating Watch** Alerts to the possibility of a rating change subsequent to, or, in anticipation of some material identifiable event with indeterminable rating implications. But it does not mean that a rating change is inevitable. A watch should be resolved within foreseeable future, but may continue if underlying circumstances are not settled. Rating watch may accompany rating outlook of the respective opinion.

**Suspension** It is not possible to update an opinion due to lack of requisite information. Opinion should be resumed in foreseeable future. However, if this does not happen within six (6) months, the rating should be considered withdrawn.

**Withdrawn** A rating is withdrawn on a) termination of rating mandate, b) the debt instrument is redeemed, c) the rating remains suspended for six months, d) the entity/issuer defaults., or/and e) PACRA finds it impractical to surveil the opinion due to lack of requisite information.

**Harmonization** A change in rating due to revision in applicable methodology or underlying scale.

**Surveillance.** Surveillance on a publicly disseminated rating opinion is carried out on an ongoing basis till it is formally suspended or withdrawn. A comprehensive surveillance of rating opinion is carried out at least once every six months. However, a rating opinion may be reviewed in the intervening period if it is necessitated by any material happening.

**Note.** This scale is applicable to the following methodology(s):

<p><b>Entities</b></p> <ul style="list-style-type: none"> <li>a) Broker Entity Rating</li> <li>b) Corporate Rating</li> <li>c) Financial Institution Rating</li> <li>d) Holding Company Rating</li> <li>e) Independent Power Producer Rating</li> <li>f) Microfinance Institution Rating</li> <li>g) Non-Banking Finance Companies (NBFCs) Rating</li> </ul>	<p><b>Instruments</b></p> <ul style="list-style-type: none"> <li>a) Basel III Compliant Debt Instrument Rating</li> <li>b) Debt Instrument Rating</li> <li>c) Sukuk Rating</li> </ul>
--	---

**Disclaimer:** PACRA has used due care in preparation of this document. Our information has been obtained from sources we consider to be reliable but its accuracy or completeness is not guaranteed. PACRA shall owe no liability whatsoever to any loss or damage caused by or resulting from any error in such information. Contents of PACRA documents may be used, with due care and in the right context, with credit to PACRA. Our reports and ratings constitute opinions, not recommendations to buy or to sell.

### **Rating Team Statements**

(1) Rating is just an opinion about the creditworthiness of the entity and does not constitute recommendation to buy, hold or sell any security of the entity rated or to buy, hold or sell the security rated, as the case may be | Chapter III; 14-3-(x)

### **2) Conflict of Interest**

i. The Rating Team or any of their family members have no interest in this rating | Chapter III; 12-2-(j)

ii. PACRA, the analysts involved in the rating process and members of its rating committee, and their family members, do not have any conflict of interest relating to the rating done by them | Chapter III; 12-2-(e) & (k)

iii. The analyst is not a substantial shareholder of the customer being rated by PACRA [Annexure F; d-(ii)] Explanation: for the purpose of above clause, the term "family members" shall include only those family members who are dependent on the analyst and members of the rating committee

### **Restrictions**

(3) No director, officer or employee of PACRA communicates the information, acquired by him for use for rating purposes, to any other person except where required under law to do so. | Chapter III; 10-(5)

(4) PACRA does not disclose or discuss with outside parties or make improper use of the non-public information which has come to its knowledge during business relationship with the customer | Chapter III; 10-7-(d)

(5) PACRA does not make proposals or recommendations regarding the activities of rated entities that could impact a credit rating of entity subject to rating | Chapter III; 10-7-(k)

### **Conduct of Business**

(6) PACRA fulfills its obligations in a fair, efficient, transparent and ethical manner and renders high standards of services in performing its functions and obligations; | Chapter III; 11-A-(a)

(7) PACRA uses due care in preparation of this Rating Report. Our information has been obtained from sources we consider to be reliable but its accuracy or completeness is not guaranteed. PACRA does not, in every instance, independently verifies or validates information received in the rating process or in preparing this Rating Report | Clause 11-(A)(p).

(8) PACRA prohibits its employees and analysts from soliciting money, gifts or favors from anyone with whom PACRA conducts business | Chapter III; 11-A-(q)

(9) PACRA ensures before commencement of the rating process that an analyst or employee has not had a recent employment or other significant business or personal relationship with the rated entity that may cause or may be perceived as causing a conflict of interest; | Chapter III; 11-A-(r)

(10) PACRA maintains principal of integrity in seeking rating business | Chapter III; 11-A-(u)

(11) PACRA promptly investigates, in the event of a misconduct or a breach of the policies, procedures and controls, and takes appropriate steps to rectify any weaknesses to prevent any recurrence along with suitable punitive action against the responsible employee(s) | Chapter III; 11-B-(m)

### **Independence & Conflict of interest**

(12) PACRA receives compensation from the entity being rated or any third party for the rating services it offers. The receipt of this compensation has no influence on PACRA's opinions or other analytical processes. In all instances, PACRA is committed to preserving the objectivity, integrity and independence of its ratings. Our relationship is governed by two distinct mandates i) rating mandate - signed with the entity being rated or issuer of the debt instrument, and fee mandate - signed with the payer, which can be different from the entity

(13) PACRA does not provide consultancy/advisory services or other services to any of its customers or to any of its customers' associated companies and associated undertakings that is being rated or has been rated by it during the preceding three years unless it has adequate mechanism in place ensuring that provision of such services does not lead to a conflict of interest situation with its rating activities; | Chapter III; 12-2-(d)

(14) PACRA discloses that no shareholder directly or indirectly holding 10% or more of the share capital of PACRA also holds directly or indirectly 10% or more of the share capital of the entity which is subject to rating or the entity which issued the instrument subject to rating by PACRA; | Reference Chapter III; 12-2-(f)

(15) PACRA ensures that the rating assigned to an entity or instrument is not be affected by the existence of a business relationship between PACRA and the entity or any other party, or the non-existence of such a relationship | Chapter III; 12-2-(i)

(16) PACRA ensures that the analysts or any of their family members shall not buy or sell or engage in any transaction in any security which falls in the analyst's area of primary analytical responsibility. This clause shall, however, not be applicable on investment in securities through collective investment schemes. | Chapter III; 12-2-(l)

(17) PACRA has established policies and procedure governing investments and trading in securities by its employees and for monitoring the same to prevent insider trading, market manipulation or any other market abuse | Chapter III; 11-B-(g)

### **Monitoring and review**

(18) PACRA monitors all the outstanding ratings continuously and any potential change therein due to any event associated with the issuer, the security arrangement, the industry etc., is disseminated to the market, immediately and in effective manner, after appropriate consultation with the entity/issuer; | Chapter III | 18-(a)

(19) PACRA reviews all the outstanding ratings on semi-annual basis or as and when required by any creditor or upon the occurrence of such an event which requires to do so; | Chapter III | 18-(b)

(20) PACRA initiates immediate review of the outstanding rating upon becoming aware of any information that may reasonably be expected to result in downgrading of the rating; | Chapter III | 18-(c)

(21) PACRA engages with the issuer and the debt securities trustee, to remain updated on all information pertaining to the rating of the entity/instrument; | Chapter III | 18-(d)

### **Probability of Default**

(22) PACRA's Rating Scale reflects the expectation of credit risk. The highest rating has the lowest relative likelihood of default (i.e, probability). PACRA's transition studies capture the historical performance behavior of a specific rating notch. Transition behavior of the assigned rating can be obtained from PACRA's Transition Study available at our website. (www.pacra.com). However, actual transition of rating may not follow the pattern observed in the past | Chapter III | 14-(F-VII)

### **Proprietary Information**

(23) All information contained herein is considered proprietary by PACRA. Hence, none of the information in this document can be copied or, otherwise reproduced, stored or disseminated in whole or in part in any form or by any means whatsoever by any person without PACRA's prior written consent