Asset-Backed Securities

The Securitization Process

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Asset-Backed Securities

- ❑ The basic idea
- ❑ What's needed?
- ❑ The technique
- ❑ Applications
- ❑ Typical sequence

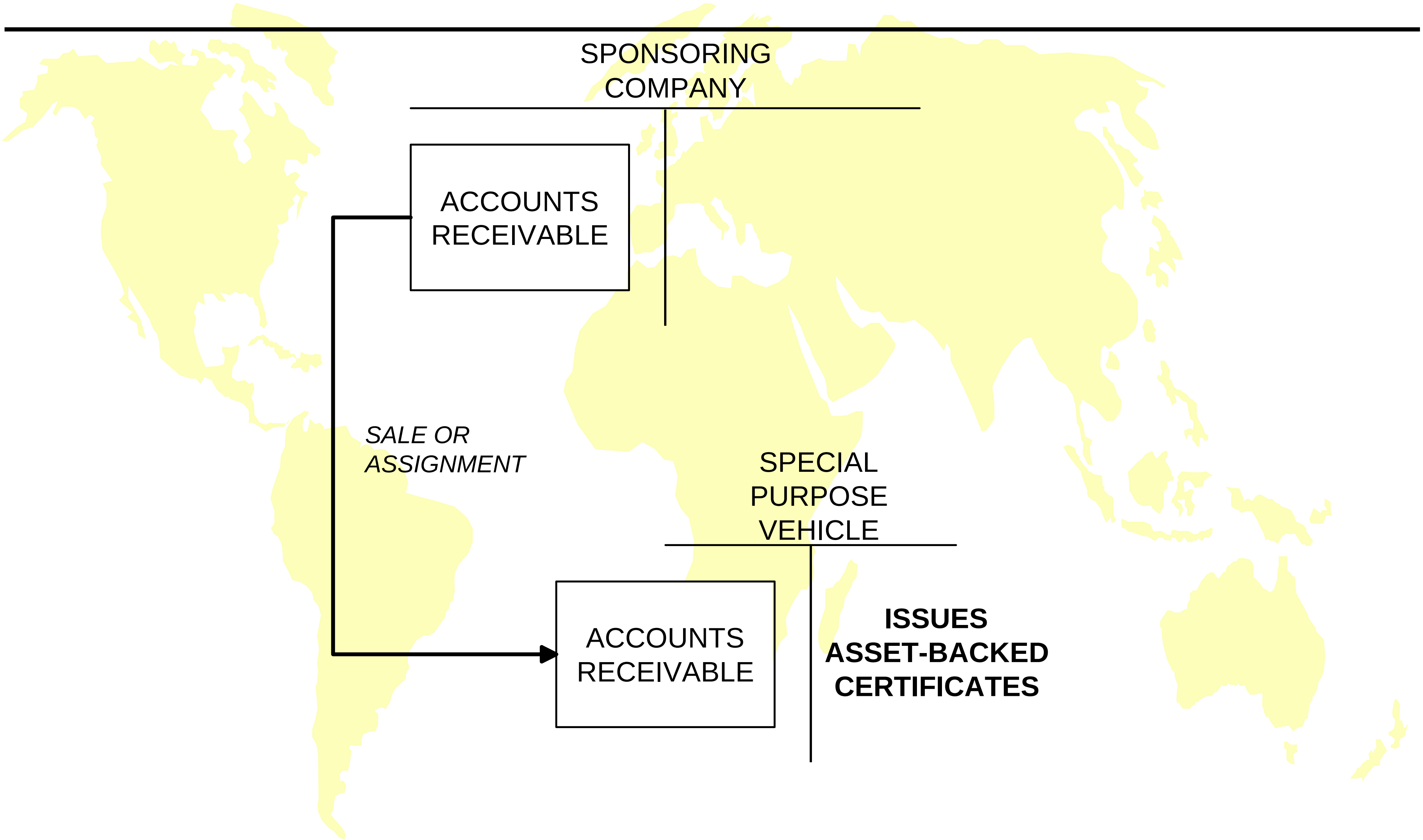
Securitization of Assets

- *Securitization is the transformation of an illiquid asset into a security.*
- For example, a group of consumer loans can be transformed into a publically-issued debt security.
- A security is tradable, and therefore more liquid than the underlying loan or receivables. Securitization of assets can lower risk, add liquidity, and improve economic efficiency.
- **Sometimes,assets are worth more off the balance sheet than on it.**

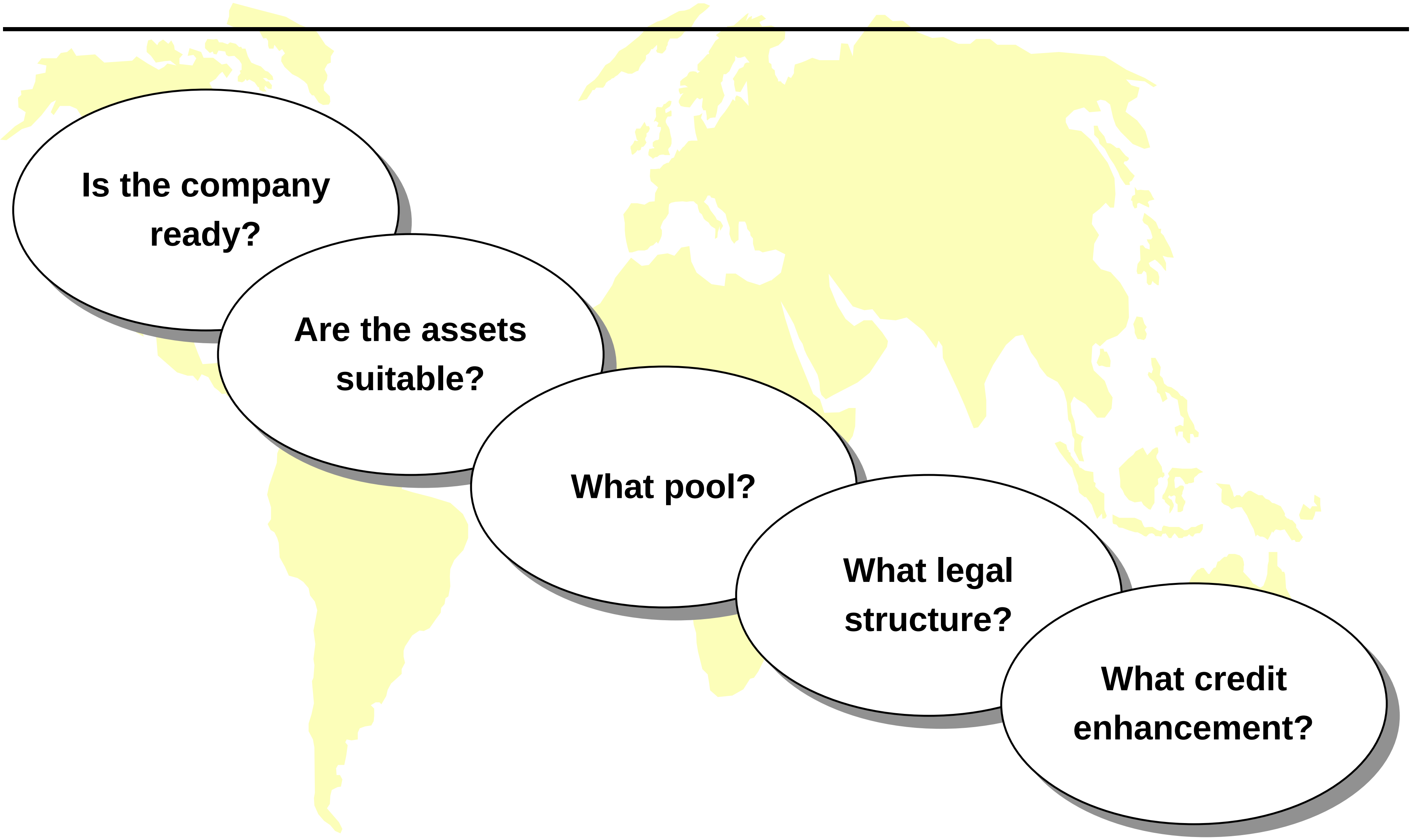
What is the Technique for Creating Asset-Backed Securities?

- A lender originates loans, such as to a homeowner or corporation.
- The securitization structure is added. The bank or firm sells or assigns certain assets, such as consumer receivables, to a special purpose vehicle.
- The structure is legally insulated from management
- Credit enhancement and rating agency reviews
- The SPV issues debt, dividing up the benefits (and risks) among investors on a pro-rata basis

Securitization: The Basic Structure



The Process


Is the company ready?
Are the assets suitable?
What pool?
What legal structure?
What credit enhancement?

Is the Company Ready for ABS?

- Does the originator currently face a **high cost of funding** assets that would be recognized as sound, cash-generating assets if taken in isolation?
- Does it have a regulatory or **capital constraint** that makes freeing up the balance sheet important?
- Does it have **data** about the assets (required by rating agencies and financial guarantors)?
- Does it have the **servicing** process and systems that can meet the more demanding standards of the asset-backed market?
- Is the originator **willing** to undertake a complex, time-consuming transaction to obtain a broader, potentially cheaper, ongoing source of funding?

Are the Assets Suitable?

The Pool of Assets Should Have:

- Volume which is sufficiently large and homogenous to facilitate statistical analysis
- A stable history of rates, defaults, delinquencies, prepayments and so forth
- Sufficient diversification--for example, geographic and socio- economic--to reduce vulnerability to economic stresses
- Basic lender's credit quality standards that are capable of being evaluated and approved by rating agencies and specialized financial guaranty companies
- Assets must be transferable and unencumbered

In short, the assets themselves must be sufficiently strong to support a high credit rating without the backing of the originating lender.

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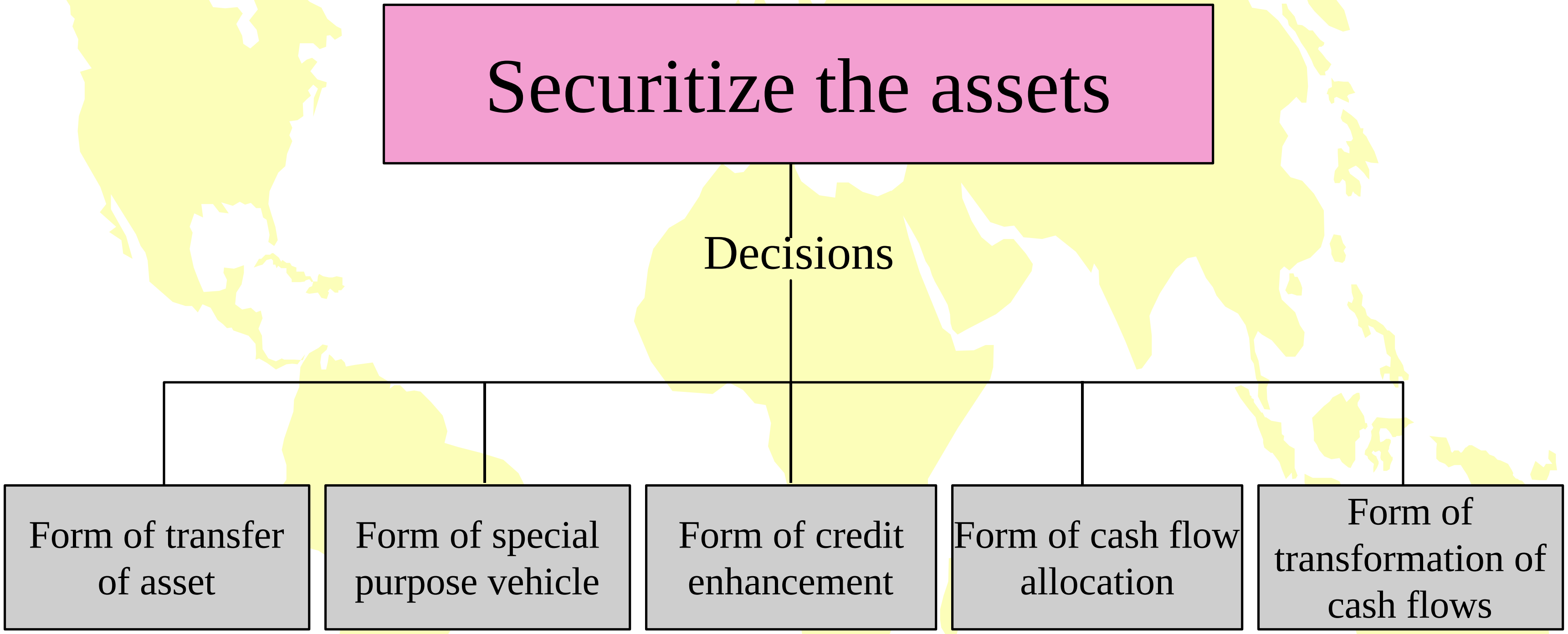
IMPLEMENTATION

Finance Company Limited

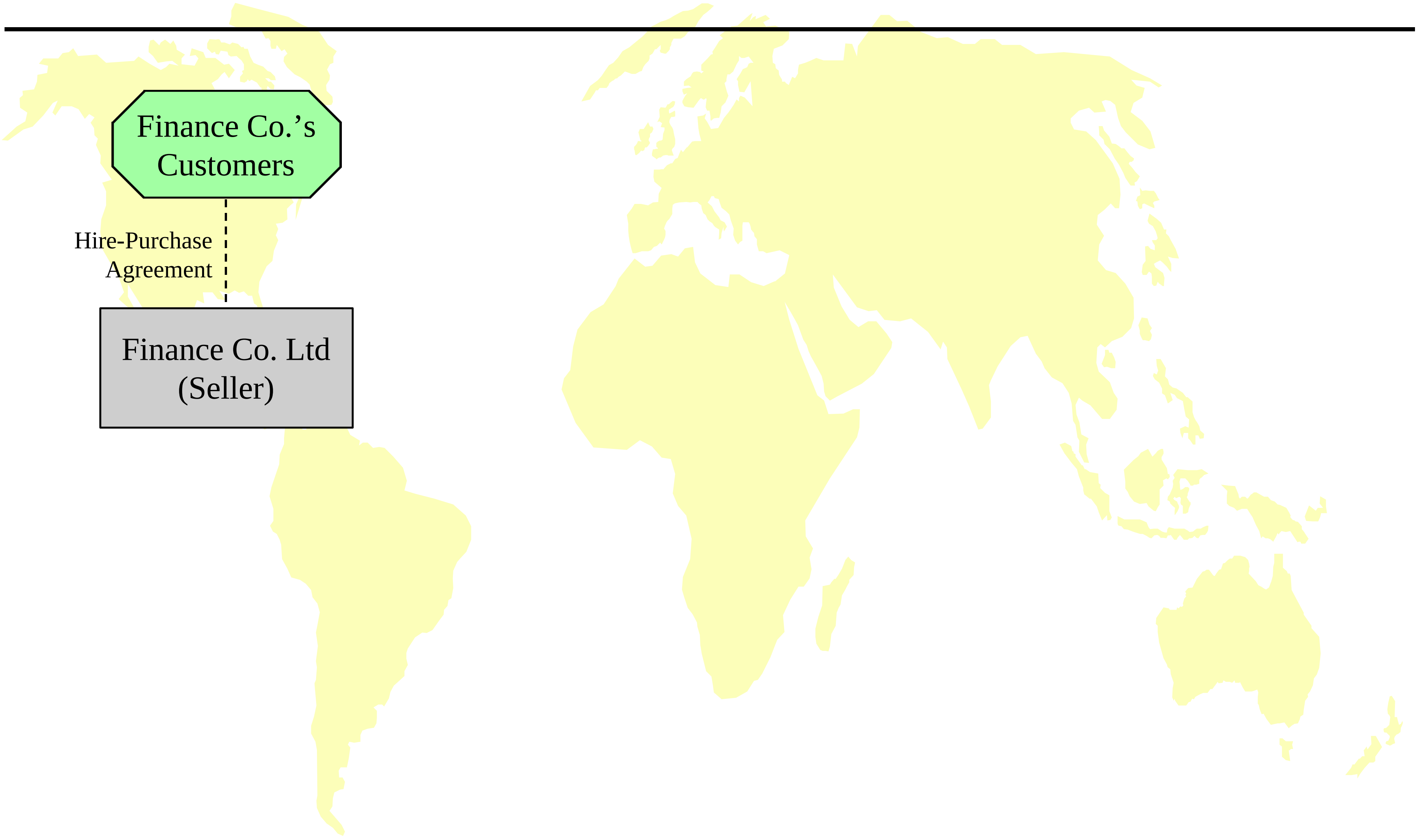
Case Study: The Company (Finance Company Limited)

- Finance company whose growth is constrained
- Has pool of automobile receivables
- Has track record
- Plans to use this as an ongoing source of financing

Key Decisions



Case Study: Initial Exchanges



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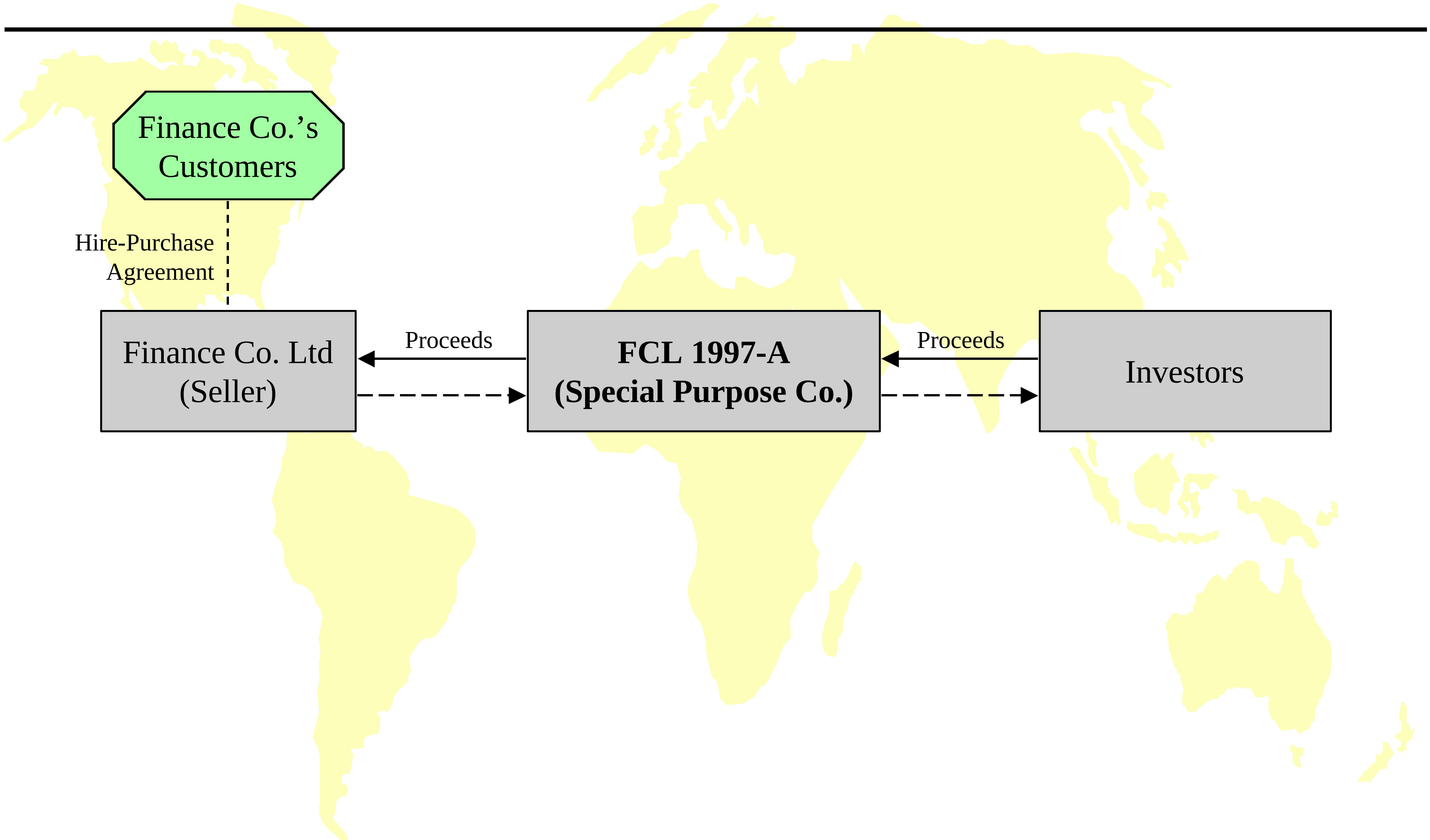
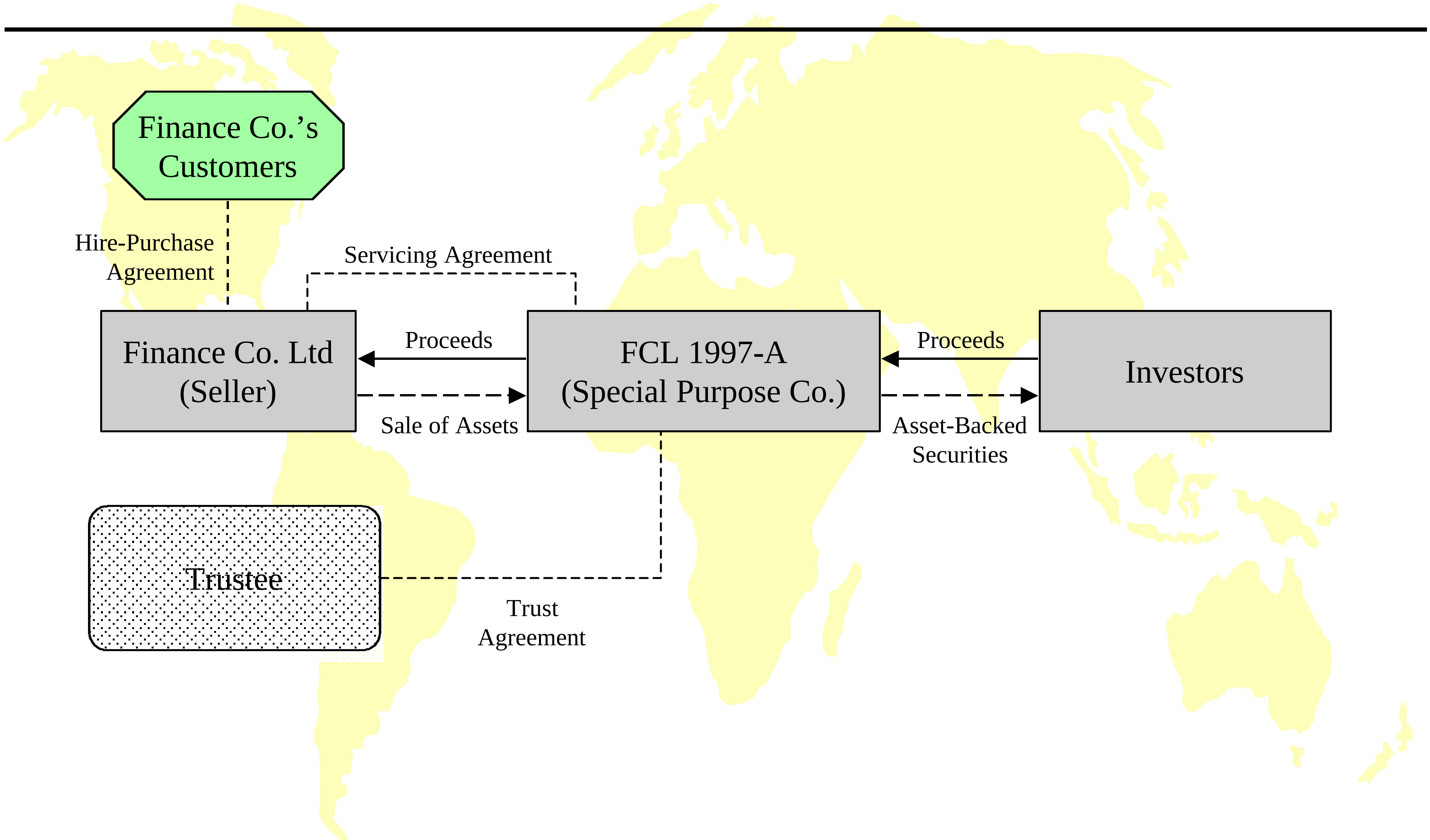
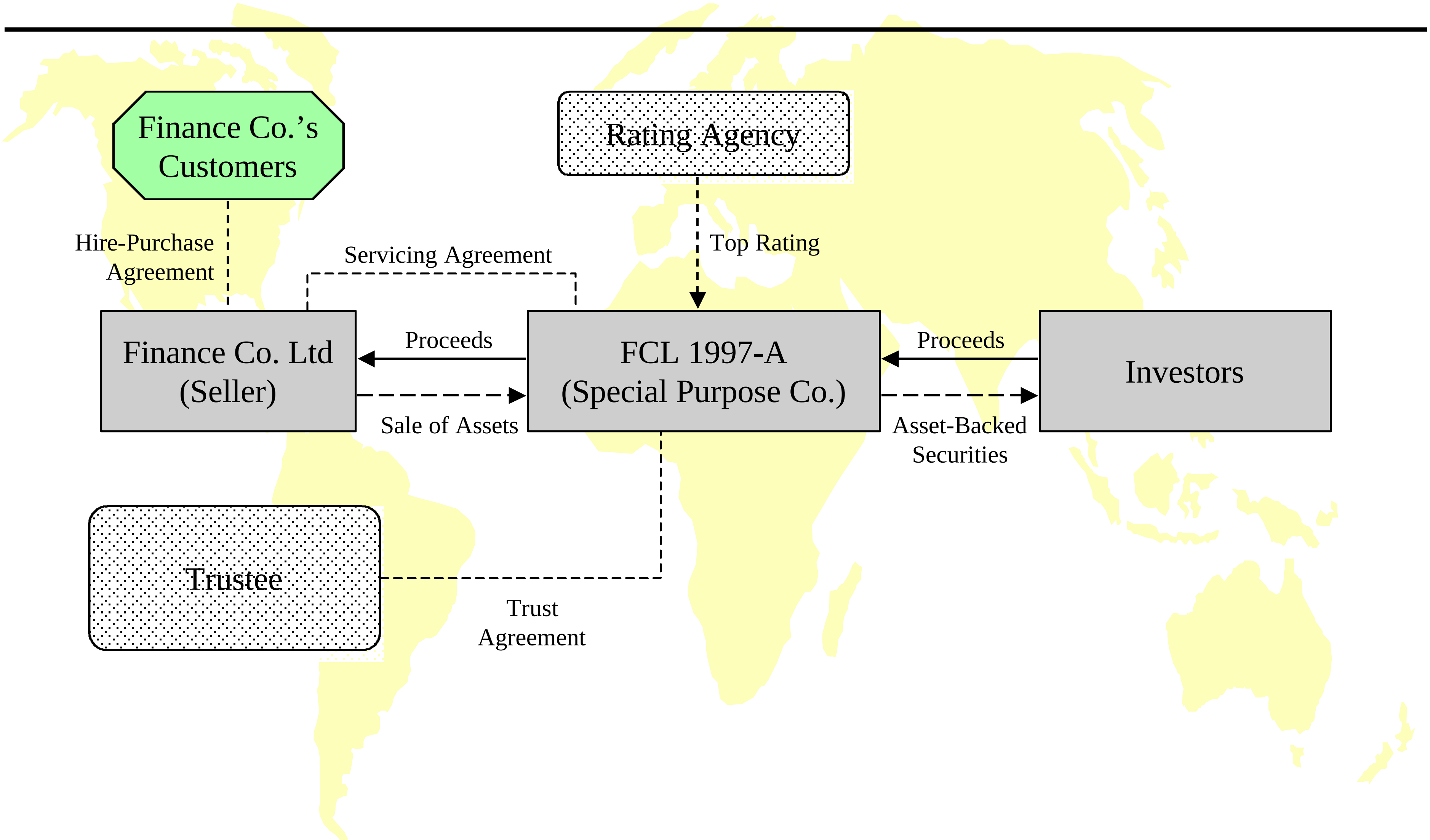


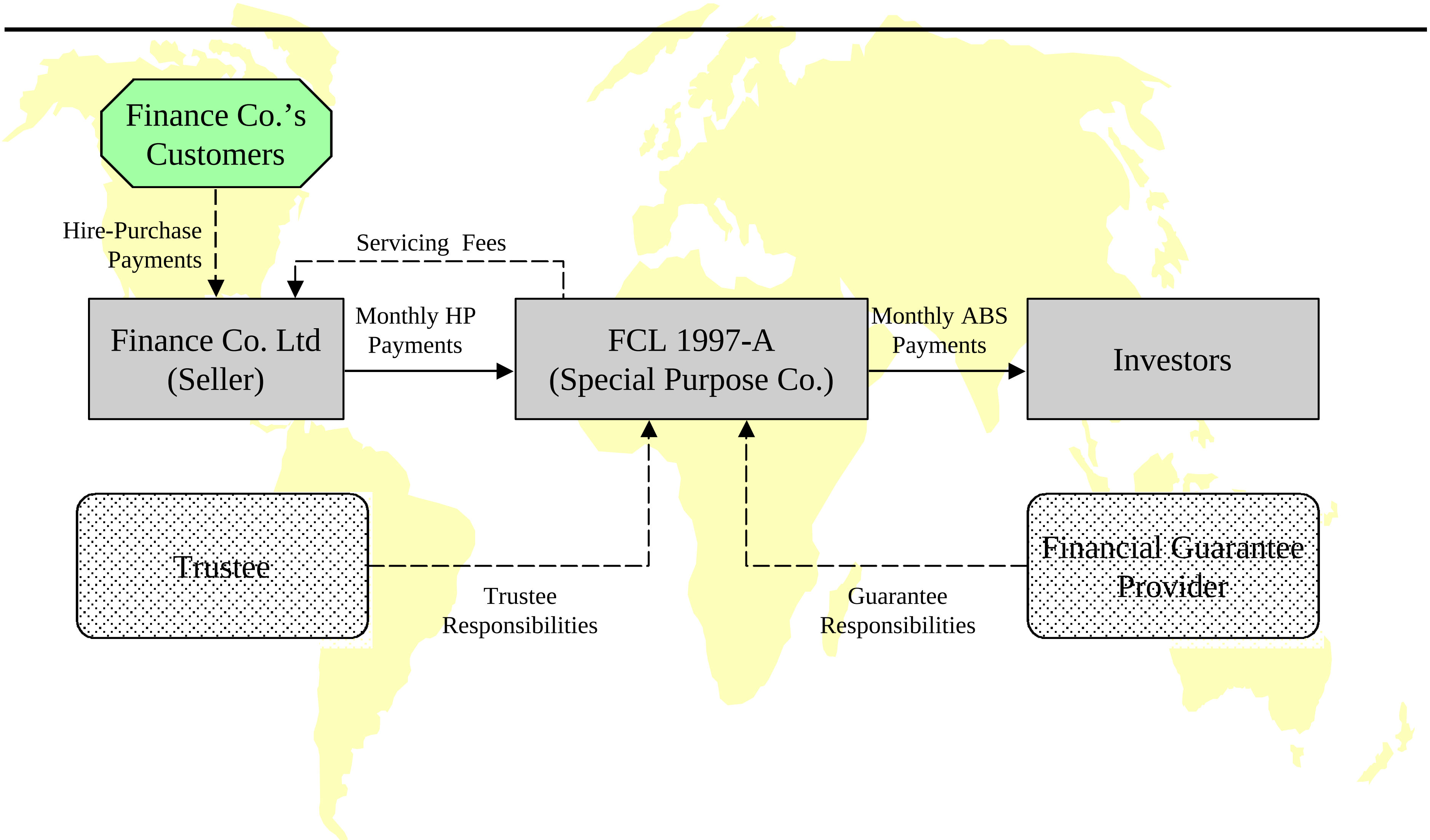
Case Study: Initial Exchanges



Case Study: Initial Exchanges



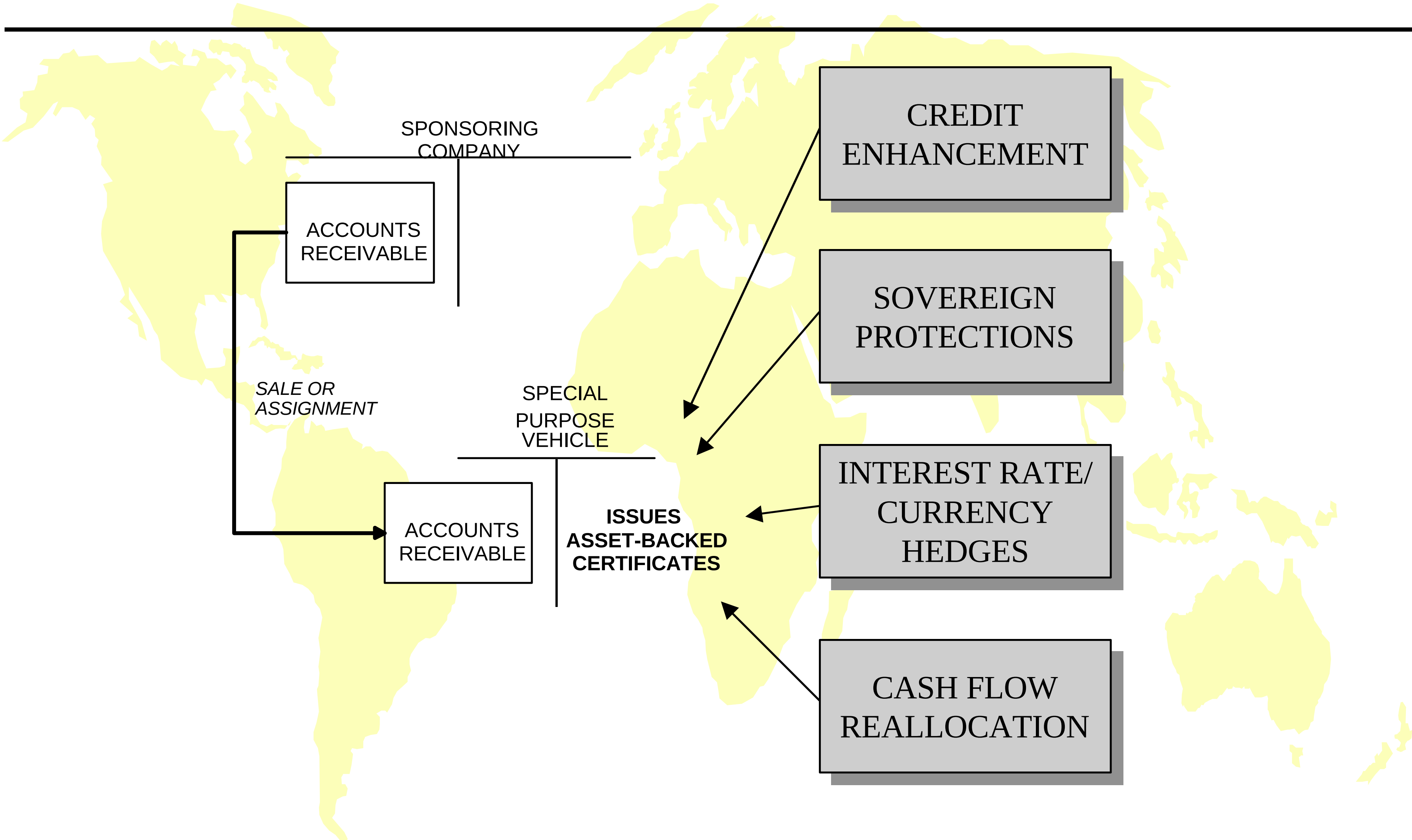
Case Study: Ongoing Payments



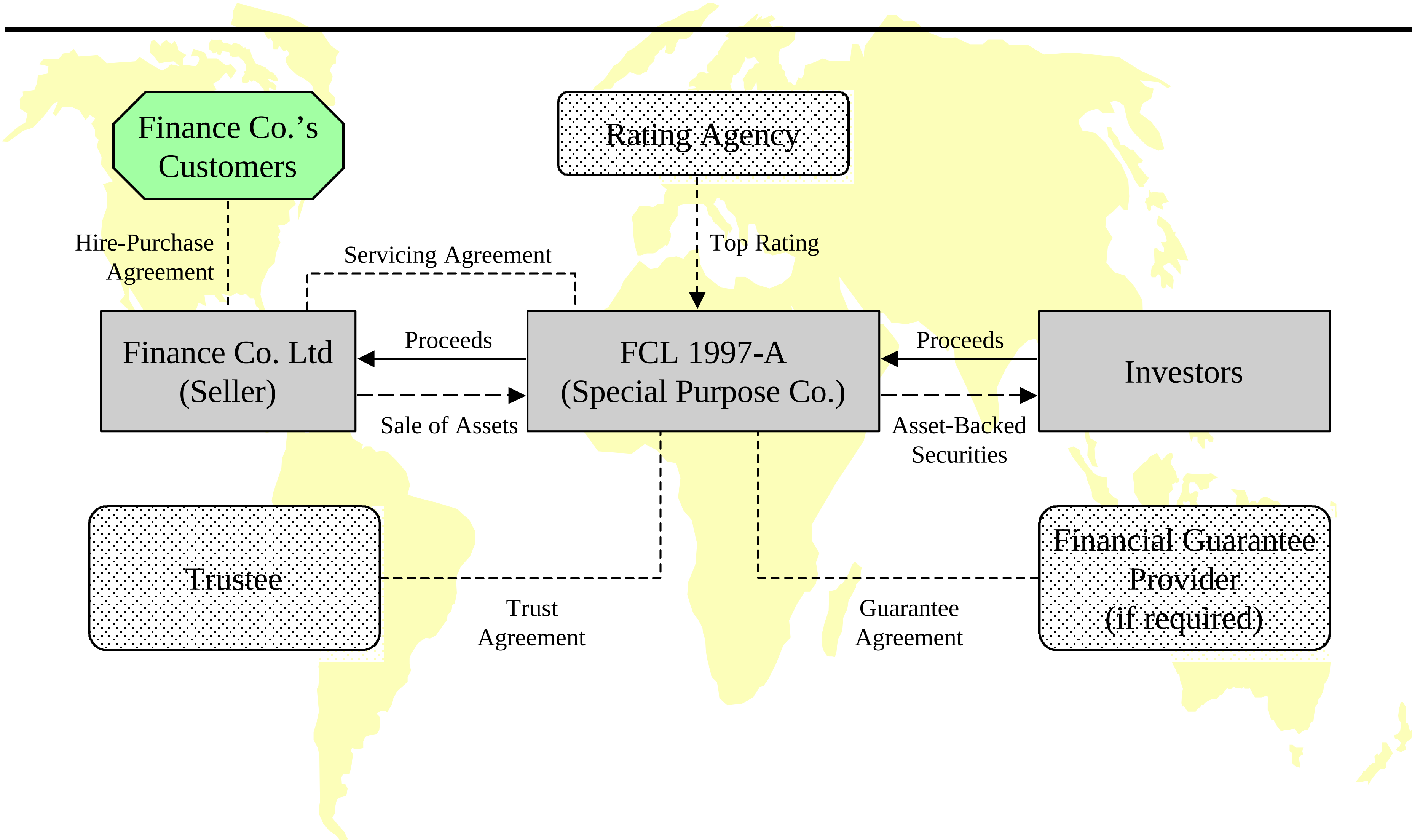
Getting a Rating: The Risks

- ❑ Credit risks
- ❑ Liquidity risk
- ❑ Servicer performance risk
- ❑ Swap counterparty risk
- ❑ Guarantor risk
- ❑ Legal risks
- ❑ Sovereign risk
- ❑ Interest rate and currency risks
- ❑ Prepayment risks

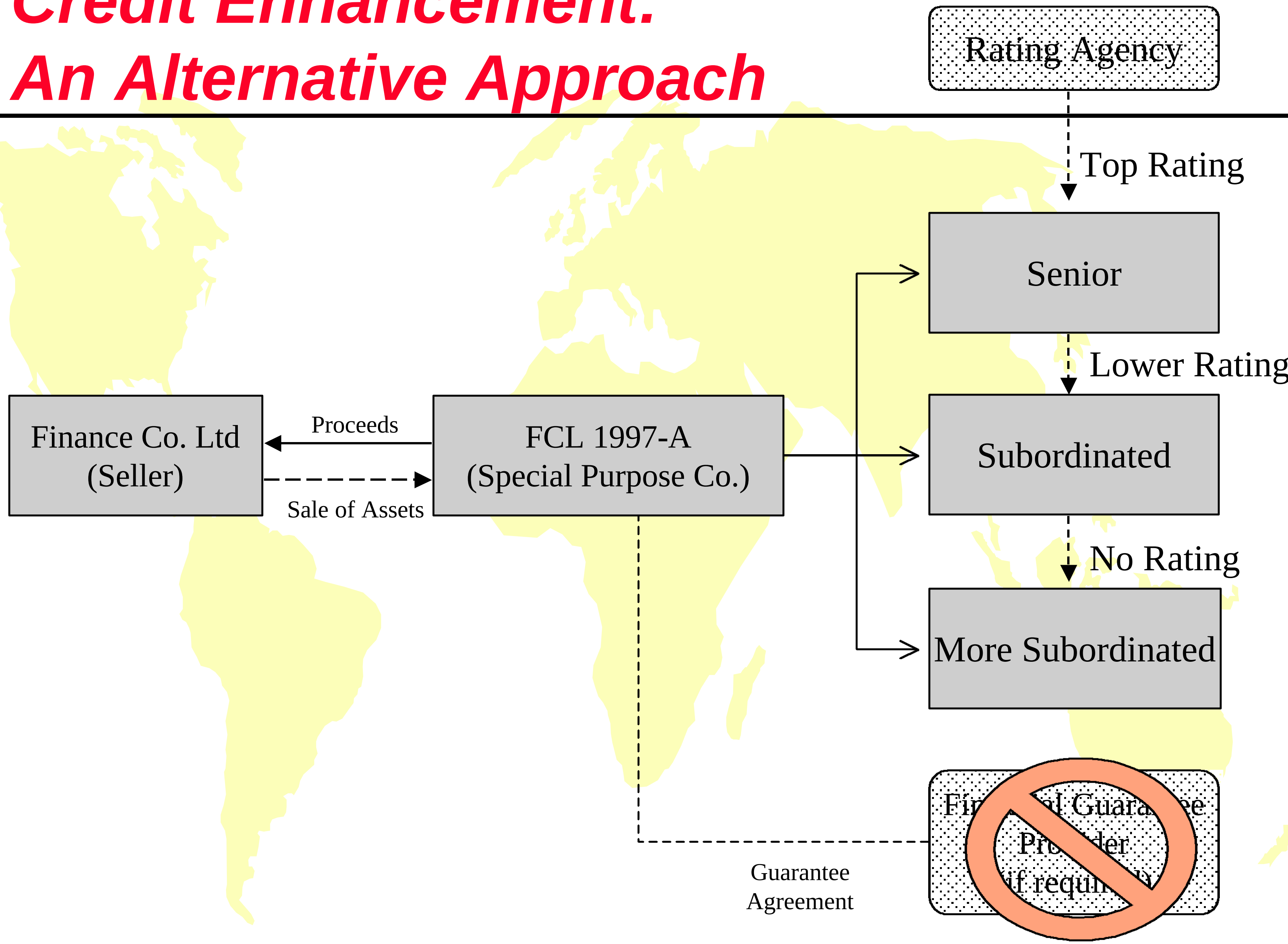
Risk-Management Techniques in ABS



Credit Enhancement: Guarantee Method



Credit Enhancement: An Alternative Approach



Asset-Backed Securities

The Rating Process and Credit Enhancement

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Rating Agencies

- Moodys
- Standard & Poors
- Fitch

Why bother with a rating?

- Compare equivalent credit risks across different kinds of debt: corporate, sovereign, ABS
- Compare alternatives across different ratings levels
- Obtain a relative as well as an absolute measure of credit risk
- Be reasonably sure of a market to sell the security.

Default Matrix

*Assumed Default Rates**

(%)

Collateral Rating	Fitch IBCA Default Curve**	Note Rating (Assumed Default Rate)				
		'BB'	'BBB'	'A'	'AA'	'AAA'
'AAA'	1.0	0.0	0.5	0.8	1.0	1.3
'AA'	1.2	0.6	0.9	1.2	1.4	2.3
'A'	1.3	1.0	1.3	1.6	4.3	5.0
'BBB'	4.0	4.0	5.0	10.0	12.0†	14.0
'BB+'	12.7	16.1	18.4	25.3	34.8	47.5
'BB'	16.0	20.0	21.6	27.9	39.9	54.3
'BB–'	20.6	24.3	26.8	34.0	46.4	59.7
'B+'	25.2	29.0	31.6	39.1	50.5	64.1
'B'	29.9	33.2	35.8	43.3	52.3	67.2
'B–'	34.5	36.9	39.7	48.3	57.0	70.8

*Midpoint stressed default rates for corporate bonds. Loan default rates would be slightly lower. **Cumulative 10-year default probability of a corporate bond at an initial rating level. †For example, credit enhancement levels for an 'AA' note rating must cover 12% default stress on a portfolio with an average rating of 'BBB'.

Source: Fitch, "Bank CLOs"

Rating Reports: Who Pays for Them?

- General reports on a sector, like CLOs
- Pre-sale report on an individual CLO, once risks have been evaluated but final terms and credit enhancement have not yet been finanized
- Final deal report
- Periodic updates

ABS: Factors Agencies Examine

- Asset portfolio analysis
- Legal structure of the transaction
- Quality of the originator/servicer
- The trustee
- The cash flow structure
- The counterparties

Rating Agencies: Business Analysis

- ❑ Organization and management structure
- ❑ Financial performance
- ❑ Business strategy and planning processes
- ❑ Controls and procedures
- ❑ Asset origination and credit assessment procedures
- ❑ Quality of its loan documentation
- ❑ Credit administation and debt recovery procedures

Credit Enhancement

- Senior/Sub or overcollateralization
- Reserve and liquidity accounts and lines
- Excess cash flow
- Third-party guarantees

The Result: Bond Credit Ratings

Moody's	Standard & Poor's	Interpretation
Aaa	AAA	High-quality debt instruments
Aa	AA	
A	A	Strong to adequate ability to pay principal and interest
Baa	BBB	
Ba	BB	Ability to pay interest and principal speculative
B	B	
Caa	CCC	
Ca	CC	
C	C	
	D	In default

Typical Rating Analysis

- **Pre-securitization risk reduction**
  - Originator's credit underwriting standards
  - Screening of assets to be included in the portfolio
  - Diversification of the portfolio
- **Legal structure based credit risk reduction**
  - Legal insulation from originator default
  - Legal insulation from servicer default
- **Credit quality of deal participants**
  - Originator/Seller/Servicer
  - Trustee, swap counterparties
  - Guarantors
- **Integrity of cash flow structure**
  - Cash flow sufficiency and mismatches
  - Safeguards and agreements such as swaps or caps
- **Credit enhancement**
  - "Internal" credit enhancement
    - Direct recourse
    - Senior/subordination or overcollateralization
    - Reserve or spread accounts
  - "Third party" credit enhancement
    - Cash collateralized accounts
    - Financial guarantees
- **Rating**

Credit Enhancement

- Overcollateralization
- Senior/Sub or
- Reserve and liquidity accounts and lines
- Excess cash flow
- Third-party guarantees

Over-Collateralization Method

SPECIAL-PURPOSE VEHICLE

COLLATERAL POOL

OVER-COLLATERAL

SENIOR
ASSET-BACKED
SECURITIES

“EQUITY” ABS
(owned by seller)

Example of Senior/Sub Structure

Class	Rating	Subordination
A1,A2,A-x	AAA	28%
B	AA	22%
C	A	16.5%
D	BBB	12%
E	BB	8.5%
F	B	5.5%
Issuer balance	NR	0%

Possible Time Frame

months	
1 2 3	• Determination of structure • Information Memorandum • Commencement of documentation • Detailed cash flow analysis • Preparation for rating process
4	• Result of cash flow analysis • Determination of eligible receivables • Approach rating agencies and introduction of the structure envisaged • Founding of the SPV
5	• Initiation of stock exchange approval process (in case of a Bond issuance) • Draft of Offering Circular (in case of a Bond issuance) • Comments of the Rating agencies (Rating confirmation)
6	• Determination of funding strategy • Publication of Offering Circular (in case of a Bond issuance) • Marketing (in case of a Bond issuance)
7	• Completion of documentation • Purchase of receivables and issuance of securities

This schedule serves as an indication only and may vary from transaction to transaction.

One Bank's Assessment

- The implementation of a transaction usually takes between two and six months, provided all necessary data and information is readily available.
- This time frame does not take into account the rating process.

The Securitization Process - 1

One Bank's List

A private placement for a client who has done previous securitizations

- Select securitization counsel and accountants
- Consider tax, accounting and securitization objectives
- Discuss data fields required for loan data file
- Define data to be audited by accountants
- Begin drafting Private Placement Memorandum (PPM)
- Begin drafting legal documents
- Assemble preliminary pool and create initial data tape
- Consider preliminary bond structure
- Select rating agencies
- Perform integrity check on data tape (cracking the tape)

If new client, this would follow screening of corporation and loan pool for suitability

Any info used in the PPM or in the pool analysis must be audited.

If it's a public offering, need a public Prospectus or Prospectus Supplement.

A discussion with rating agency be necessary for selection of legal structure and pool selection if it's a new type of ABS.

Data from companies come in many different forms.

The Securitization Process - 2

One Bank's List

- Model cash flow and bond structure
- Prepare rating agency presentation
- Select trustee/backup servicer
- Reconcile discrepancies with accountants
- Distribute rating agency presentations
- Meet with rating agencies
- Determine pending loan closings
- Select rating agencies and sign engagement letters
- Optimize loan pool and revise bond structure
- Rating agency borrower visits (if necessary)
- Rating agency due diligence (if necessary)
- Complete loan closings and finalize loan pool
- Obtain preliminary subordination levels from rating agencies

Most investment banks active in ABS have developed modelling software

Invariably, with the amount of information be supplied by the issuer via the tape, there will be mistakes/discrepancies to resolve, mostly with regard to loan data that's been provided.

During this process, the issuer is still originating collateral going into the deal. The bank has to decide what else it want to include, and has to establish a "cut-off date".

Which asset should not go into the pool? Its not necessarily bad collateral, but it may still hurt the overall profile of the pool

The Securitization Process - 3

One Bank's List

- Market transaction to sub-bond buyers (if necessary)
- Tie out collateral cash flow with accountants
- Final subordination levels from rating agencies
- Finalize bond structure based on final loan pool and sub-levels
- Tie out bond cash flows with accountants
- Finalize PPM and legal documents
- Arrange distribution by other banks
- Finalize internal marketing material
- Issuer presentation to salesforce
- Print red herring PPM and distribute to investors
- Market transaction to investors
- Price bonds and execute Bond Purchase Agreement
- Print final PPM
- CLOSE TRANSACTION

Alternative would be for originator to keep sub tranche

The collateral cash flows in aggregate are structured to pay bonds. The bonds are then sold based on the likelihood that the bonds will receive those payments at a certain period in time. Therefore, the cash flows that pay the bonds are what the investor is purchasing. The bond cash flow characteristics are presented in the prospectus to investors and if they aren't tied out, there is a huge legal liability for the underwriter and issuer if they aren't correct.

This is the agreement to purchase the bonds from the SPV by the investor or investment banks

Asset-Backed Securities: Legal and Regulatory Issues

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Asset-Backed Securities: Legal and Regulatory Aspects

- Legal
  - The Transfer
  - The Special-Purpose Vehicle
- Taxation
- Accounting Treatment
- Bank Regulatory Treatment

Legal Aspects

LEGAL

- Goal: Credit quality must be solely based on the quality of the assets and the credit enhancement backing the obligation, without any regard to the originator's own creditworthiness
- Otherwise, quality of the ABS issue would be dependent on the originator's credit, and the whole rationale of the asset-backed security would be undermined.

Three conditions enable the separation of the assets and the originator

LEGAL

- The transfer must be a true sale, or its legal equivalent. If originator is only pledging the assets to secure a debt, this would be regarded as collaterized financing in which the originator would stay directly indebted to the investor.
- The assets must be owned by a special-purpose corporation, whose ownership of the sold assets is likely to survive bankruptcy of the seller.
- The special-purpose vehicle that owns the assets must be independent

The Form of Transfer: True Sale?

LEGAL

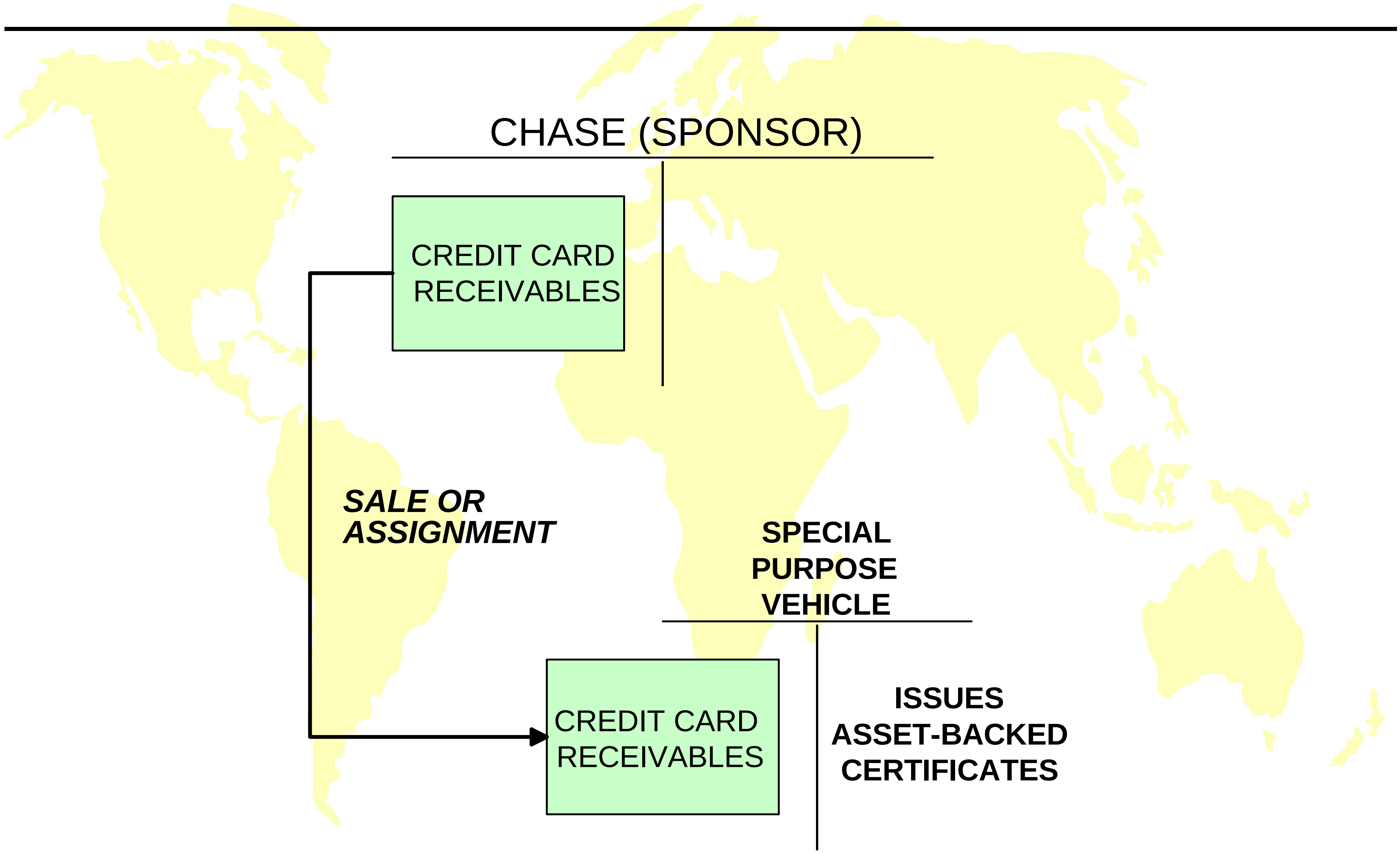
- Form of transfer of asset
  - True Sale
  - Assignment
    - Alternative: **Credit swap** (Synthetic ABS)
  - Collateral

What Makes it a Sale?

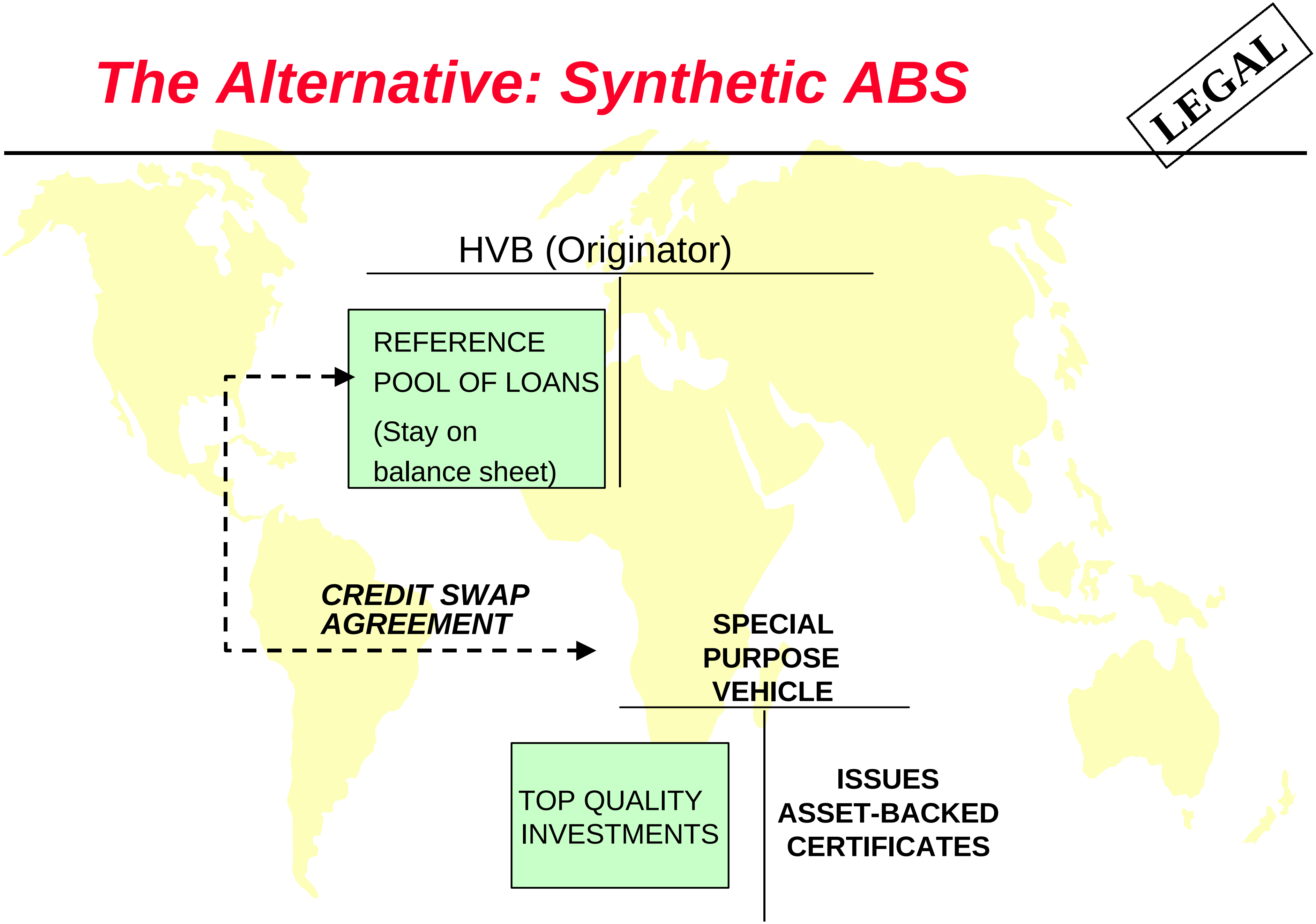
LEGAL

- The form and treatment of the transaction
- The nature and extent of the benefits transferred
- The irrevocability of the transfer
- The level and timing of the purchase price,
- Who possesses the documents
- Notification when the assets are sold

Asset Securitization



The Alternative: Synthetic ABS



Accounting Treatment

ACCOUNTING

- Sale versus financing
- Consolidation
- Accounting for loan servicing

FASB Sale Treatment

ACCOUNTING

- The transferor relinquishes control of the future economic benefits embodied in the assets being transferred
- The SPV cannot require the transferor to repurchase the assets except pusuant to certain recourse provisions
- The transferor's obligation under any recourse provision are confined and can be reasonably estimated

Bank Regulation and Capital Requirements

- *Goal: Ensure that the substance and not the form of the asset transfer is what governs capital requirements.*

The regulatory authorities may assess capital or reserve requirements as if the financing was a secured borrowing:

- Where the transfer leaves the bank open to recourse deemed risky by the authorities,
- Or where there is potential for a "moral hazard" whereby a bank may shore up potential or actual losses in the sold assets to protect its name even when not legally required to do so.

Basel 2 and ABS

- Originating banks ("clean break")
- Investing banks (use of ratings)
- Sponsor banks (for ABS conduits)
- Synthetic securitization (degree of risk transference)

Basel 2 for Investing Banks

AAA to AA-	20%
A+ to A-	50%
BBB+ to BBB-	100%
BB+ to BB-	150%
B+ and below	Deducted from capital

Source: Basel Committee on Banking Supervision, January 2001

Example:
Ford Credit Owner Trust 1999-A

$1,462,716,000
Ford Credit Auto Owner Trust 1999-A

Ford Credit Auto Receivables Two L.P.
Seller

Ford Motor Credit Company
Servicer

The trust will issue the following securities:

	Principal Amount	Interest Rate	Final Maturity Date
Class A-1 Notes	$250,000,000	5.010%	July 15, 1999
Class A-2 Notes	$296,000,000	5.089%	January 18, 2000
Class A-3 Notes	$495,000,000	5.31%	April 16, 2001
Class A-4 Notes	$313,767,000	5.31%	November 15, 2001
Class A-5 Notes(1)	$250,000,000	5.38%	June 17, 2002
Class A-6 Notes(1)	$250,000,000	5.41%	March 17, 2003
Class B Notes	$68,695,000	5.79%	June 16, 2003
Class C Certificates	$39,254,000	6.52%	August 15, 2003
Class D Certificates(1) ..	$39,254,000	8.00%	June 15, 2004

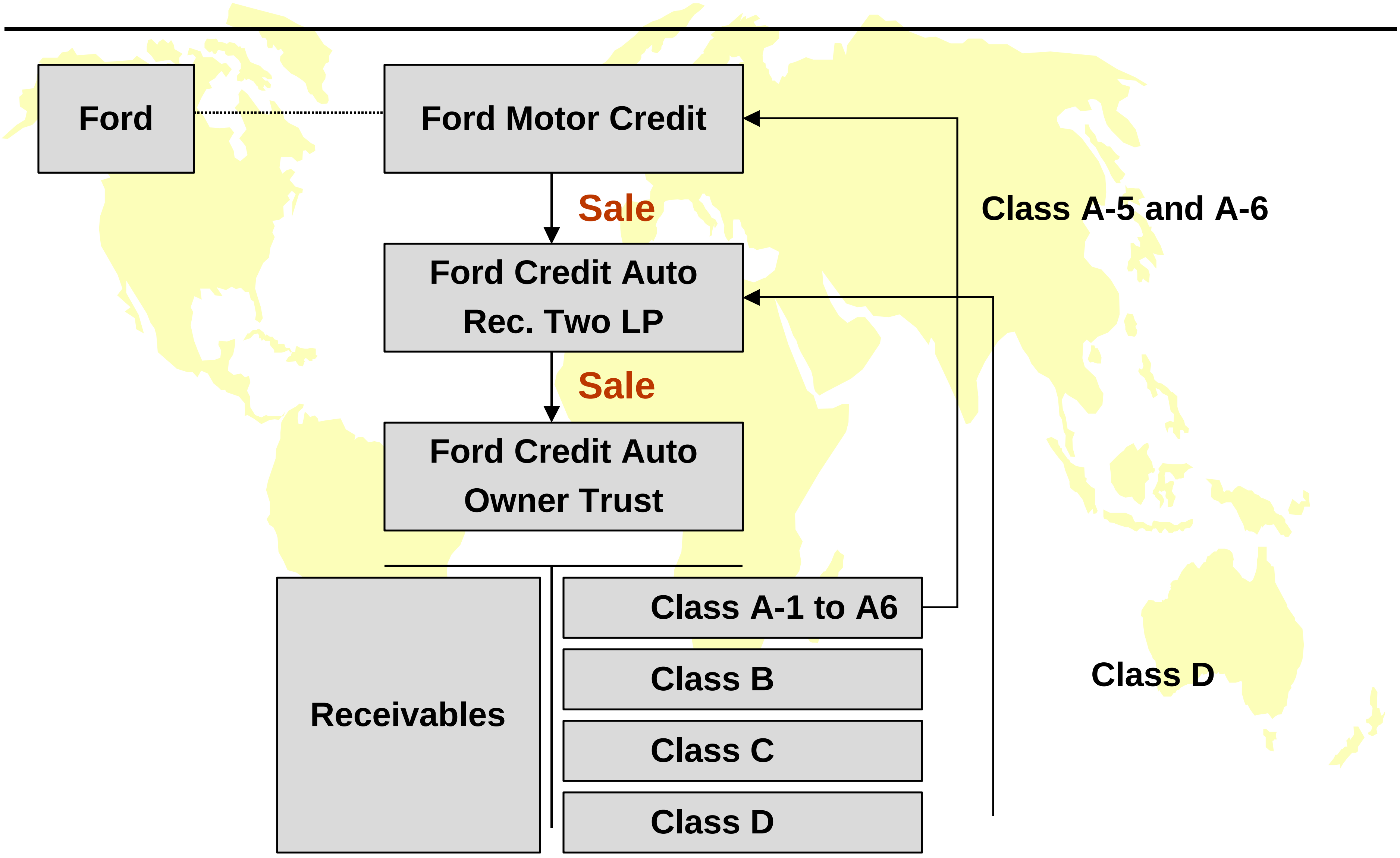
(1) The Class A-5 Notes, the Class A-6 Notes and the Class D Certificates are not being offered by this prospectus supplement.

- The trust will pay interest and principal on the securities on the 15th day of each month. The first payment date will be February 16, 1999.
- The trust will pay principal sequentially to the earliest maturing class of securities then outstanding until paid in full.

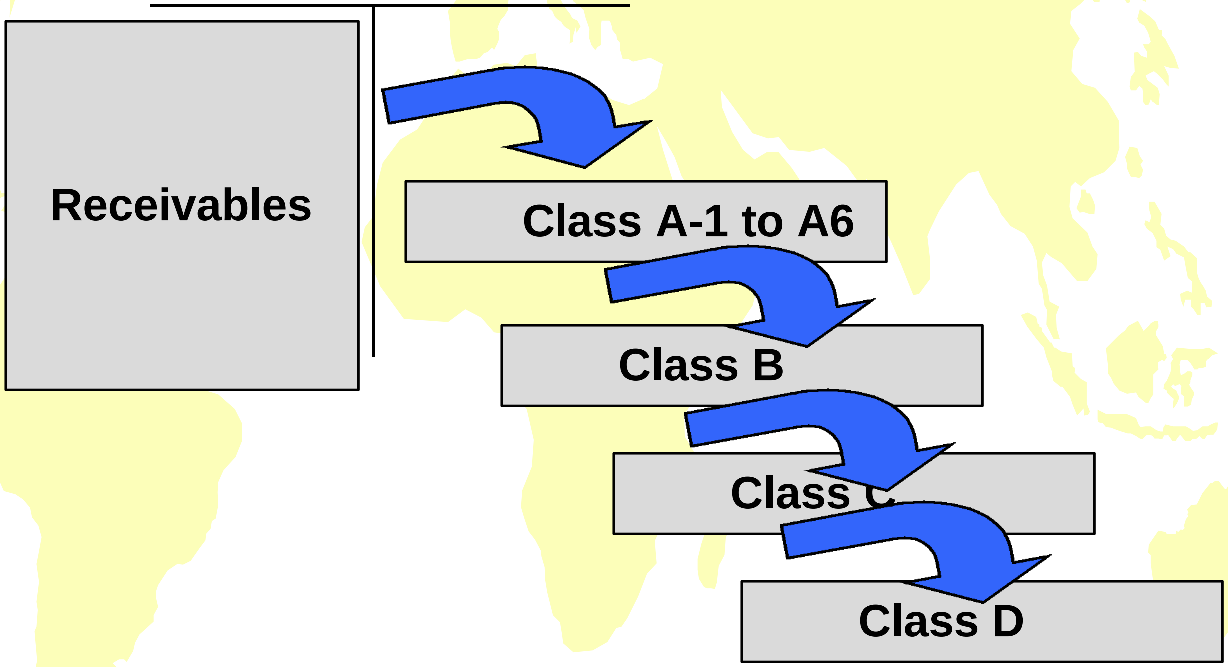
Before you purchase any of these securities, be sure you understand the structure and the risks. See especially the risk factors beginning on page S-13 of this prospectus supplement and on page 13 of the attached prospectus.

These securities are

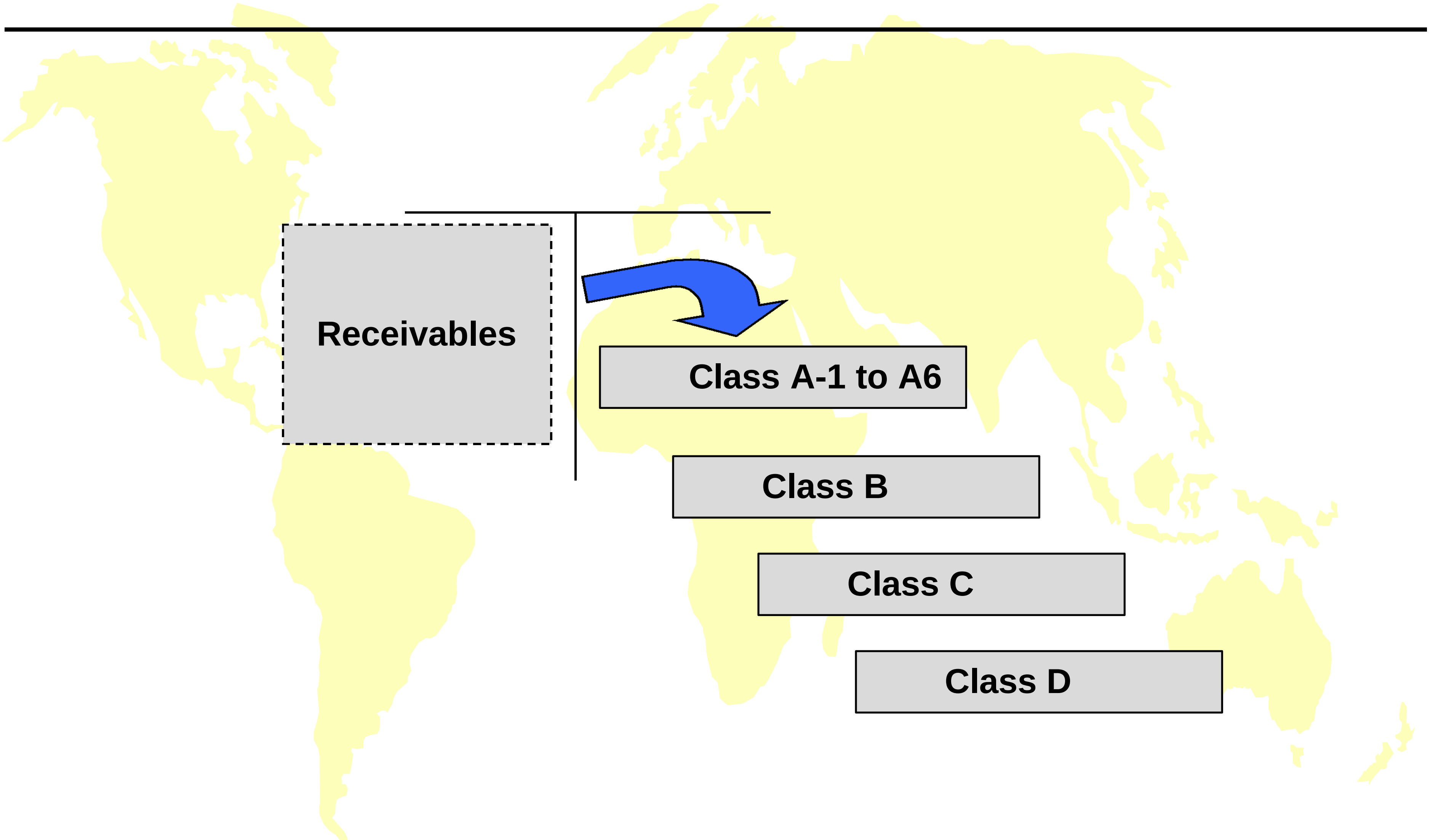
Ford Structure



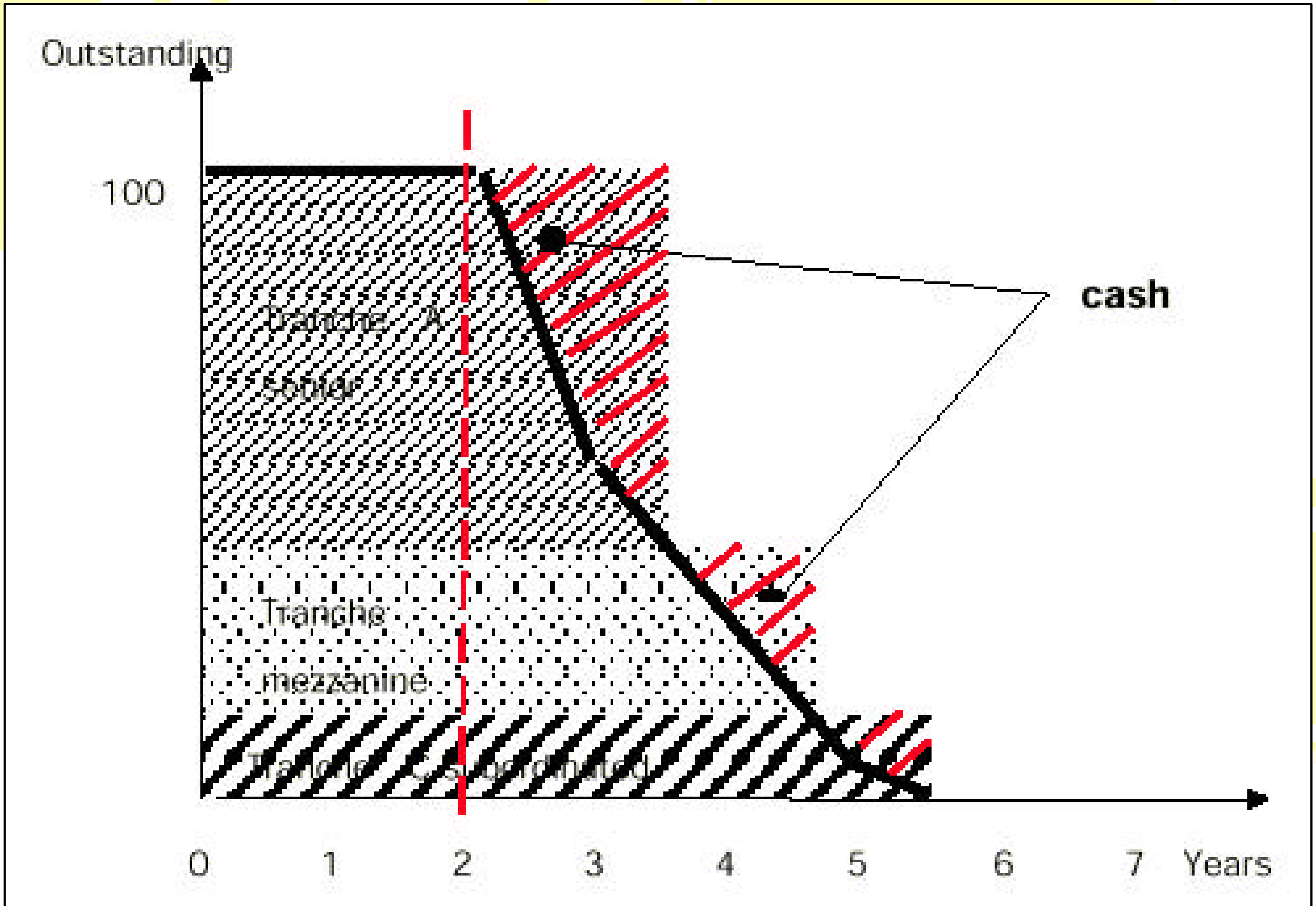
Ford Structure: Waterfall



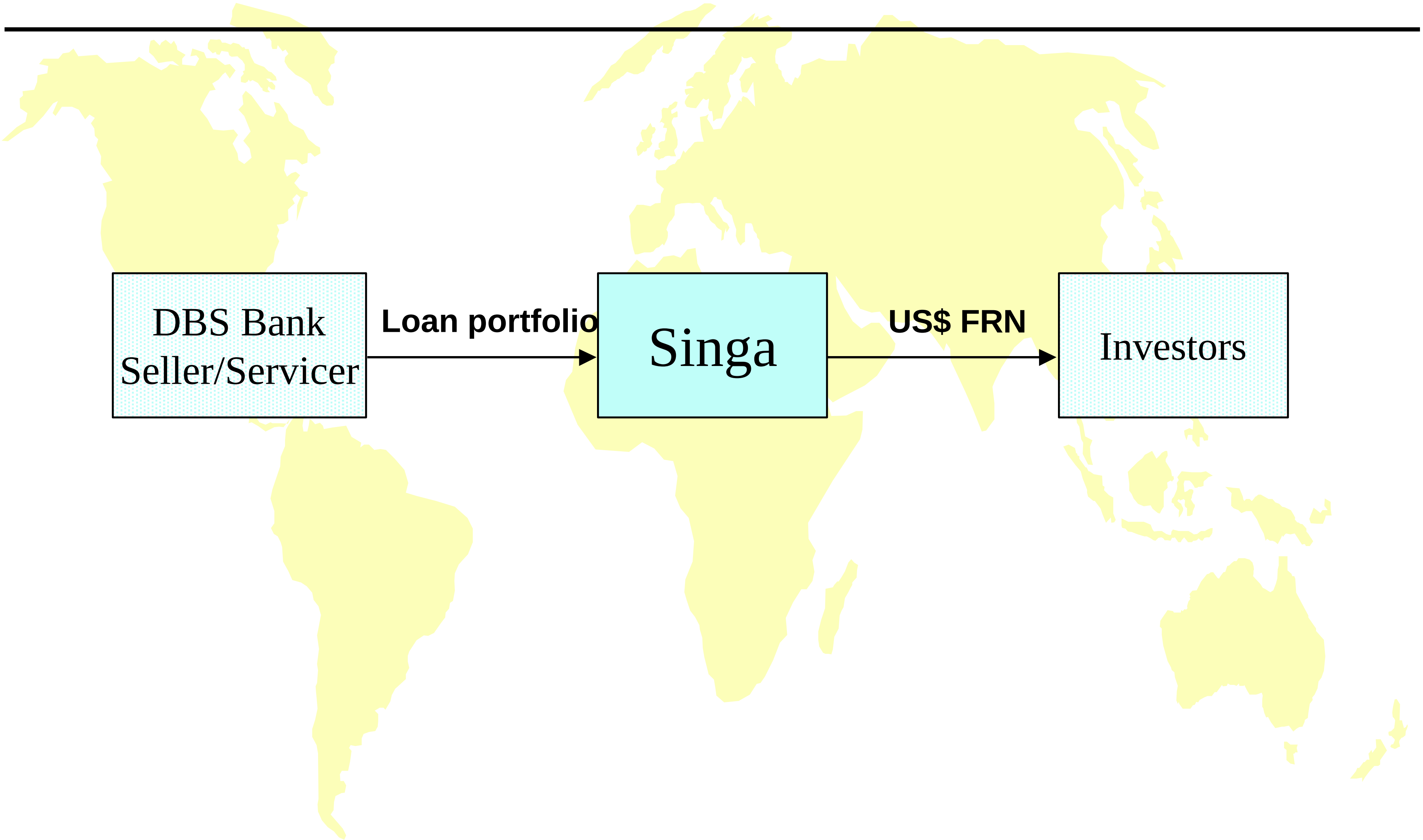
Ford Structure: Default or Loss?



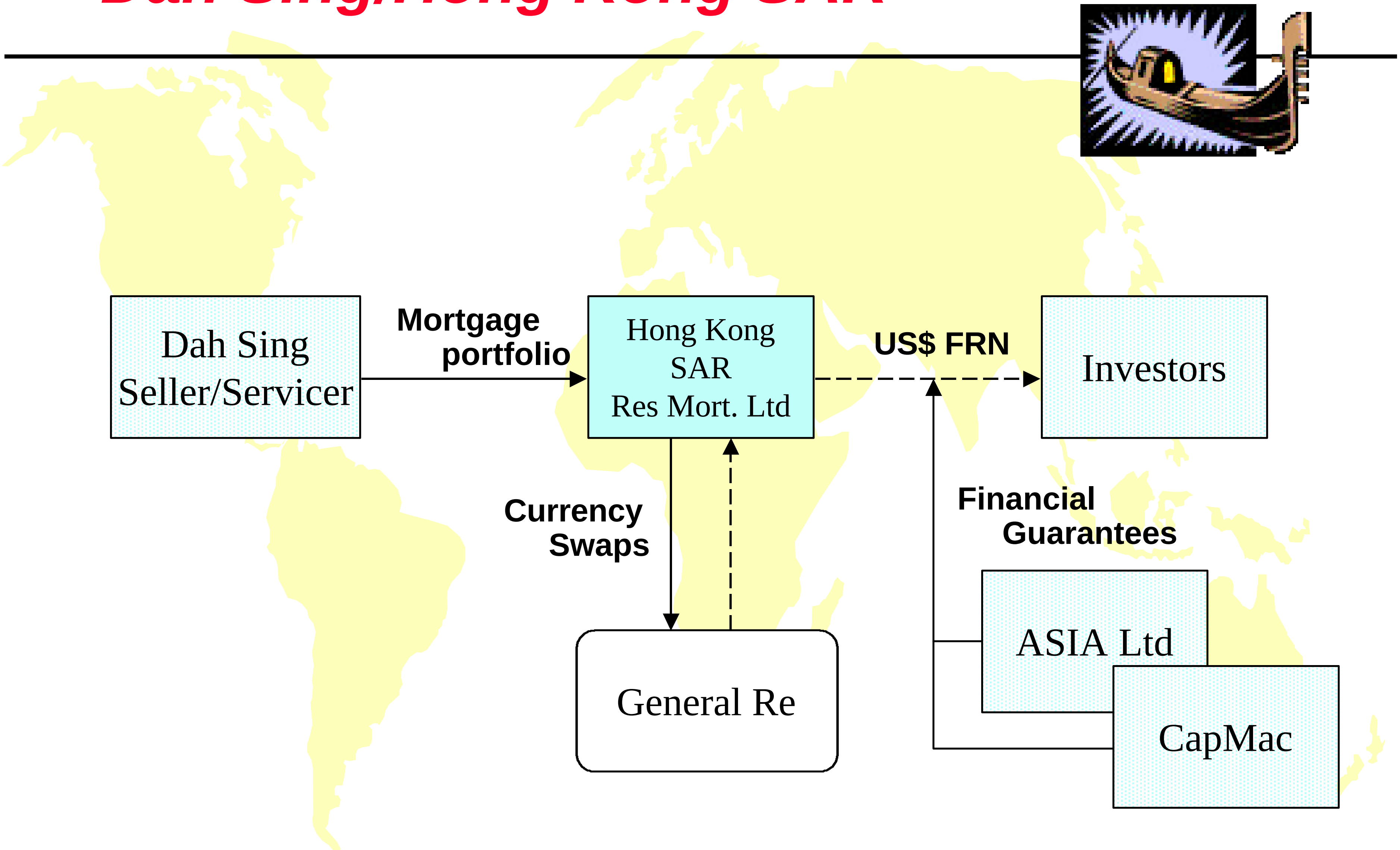
Paydown: Soft Bullet Structure



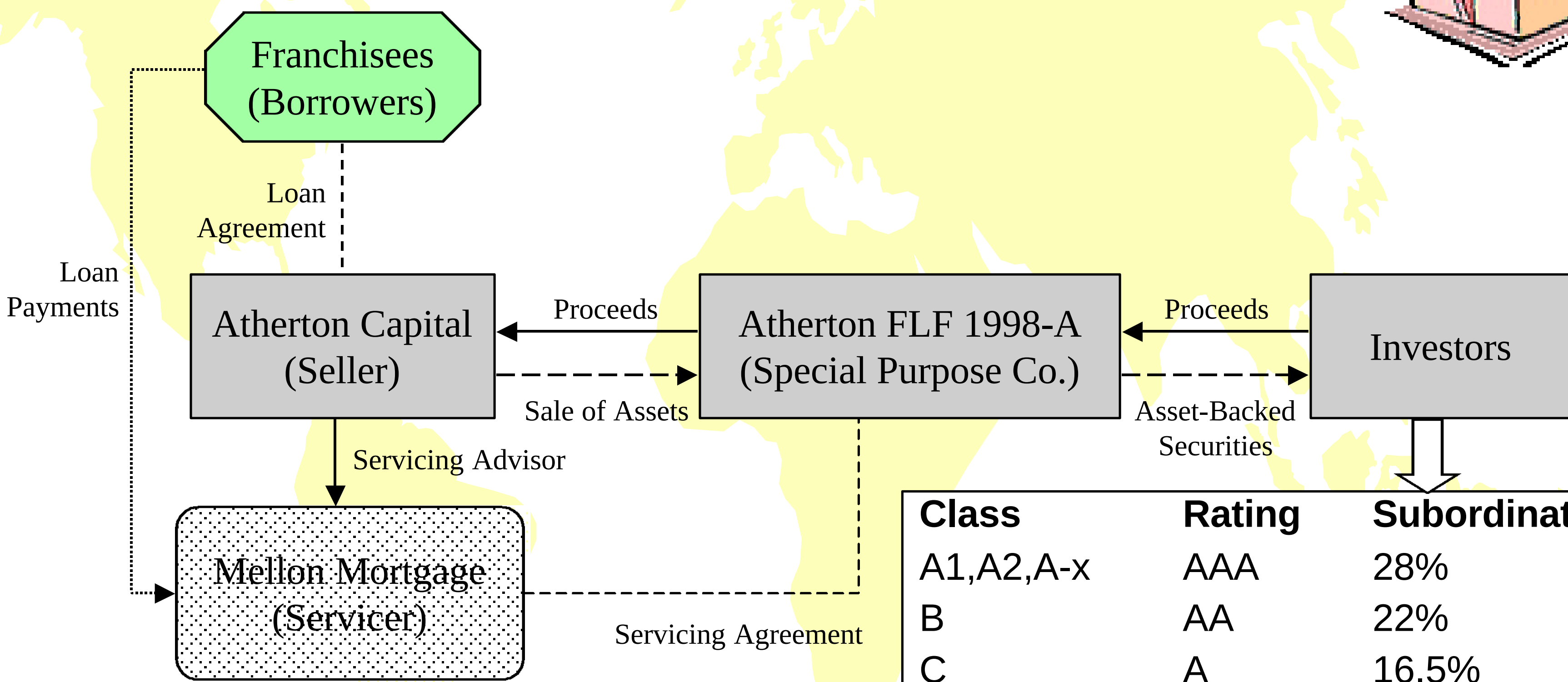
Example: DBS Singa Deal



Dah Sing/Hong Kong SAR



Franchise Loan Securitization



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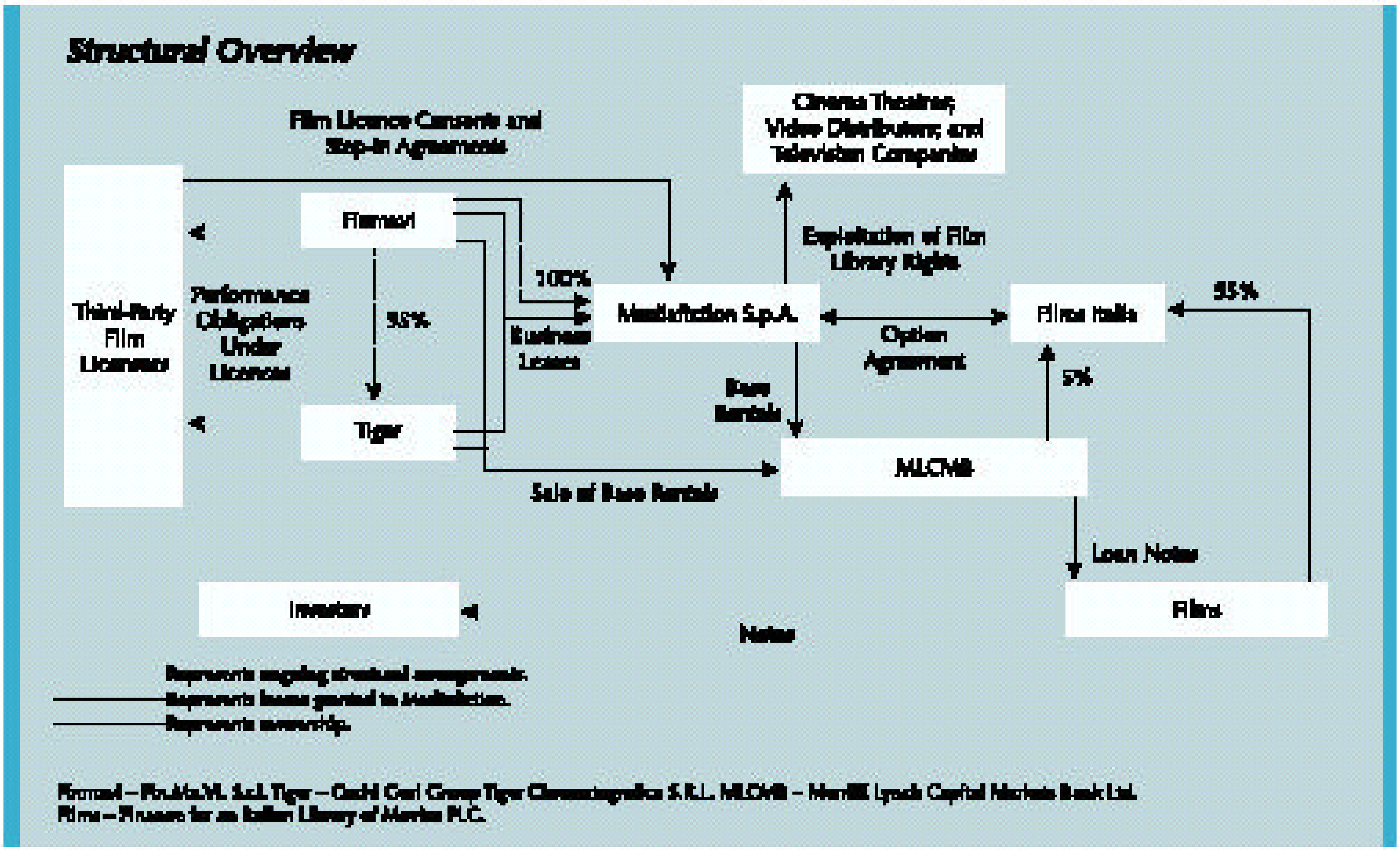
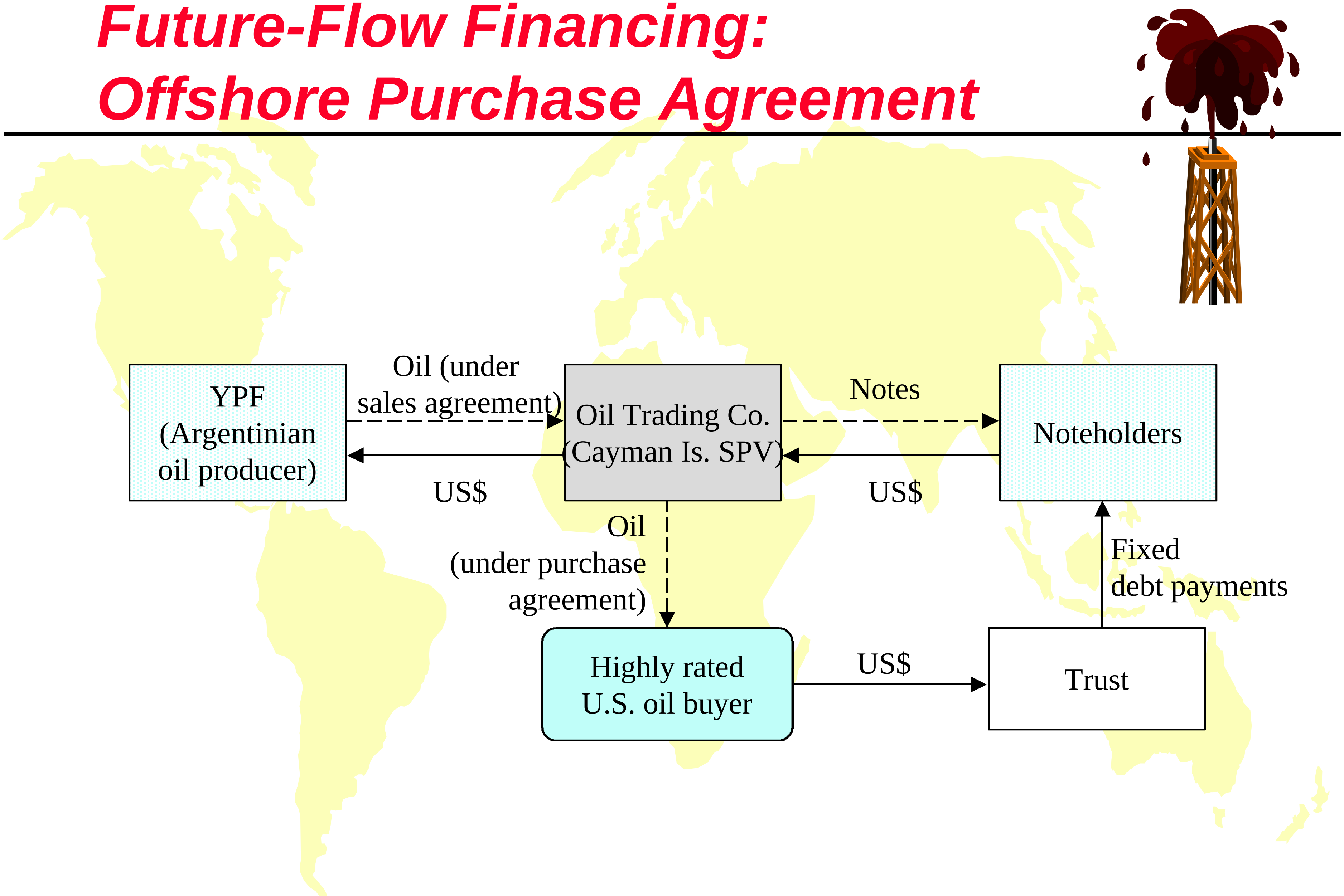
Issuer balance	NR	0%

Films (Finance for an Italian Library of Movies)



Future-Flow Financing: Offshore Purchase Agreement



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