# 行政院所屬各機關因公出國人員出國報告書 (出國類別:實習)

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# 赴香港實習「衛星業務之營運管理」報告

服務機關:中華電信股份有限公司

稱:副管理師

名: 曾琇莹 姓

出國地點:香港

出國日期: 90年11月12日至 90年11月16日

報告日期: 91年02月04日

#### 公務 出 國報告 提要

頁數: 18 含附件: 否

報告名稱:

實習「衛星業務之營運管理」

主辦機關:

中華電信股份有限公司

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出國類別: 實習出國地區: 香港

出國期間: 民國 90 年 11 月 12 日 -民國 90 年 11 月 16 日

報告日期: 民國 91 年 02 月 04 日 分類號/目: H6/電信 H6/電信

關鍵詞: 衛星業務營運管理

內容摘要: 亞太衛星控股有限公司(APT Satellite Holdings Limited以下簡稱亞太衛星公

司)與亞洲衛星控股有限公司(Asia Satellite Telecommunications Holdings Limited以下簡稱亞洲衛星有限公司)係亞洲著名之衛星公司,亞太衛星公司擁有之APSTAR V新衛星預定於2003年發射,而亞洲衛星有限公司擁有之AsiaSat 4新衛星預定於2002年發射,新加坡電訊於90年1月已租用亞太衛星公司之APSTAR V 15個C頻轉頻器並命名爲APSTAR V/ST-2。鑒於中新一號衛星轉頻器之使用率高於亞洲其餘衛星之平均值,本公司王副總經理金土博士乃指示規劃租用第二顆衛星,作爲備援衛星及增強中新一號衛星客戶之信心。因此,爲瞭解並吸取APSTAR V與AsiaSat 4之發展趨勢,衛星業務之營運策略與管理技術,據之以研擬本公司計劃租用第二顆衛星之投資評估報告及未來衛星經營策略及行銷計畫以迎合世界潮流,乃奉派至亞太衛星公司與亞洲衛星有限公司實地瞭解此二公司之營運策略及管理技術並蒐集APSTAR V與AsiaSat 4最新發展趨勢之資料。本報告分爲五章,第一章前言,第二章亞太衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理,第四章租用第二顆新衛星之評估報告,第五章觀感與建議。

本文電子檔已上傳至出國報告資訊網

# 摘要

亞太衛星控股有限公司(APT Satellite Holdings Limited 以下簡稱亞太衛星公司)與亞洲衛星控股有限公司(Asia Satellite

Telecommunications Holdings Limited 以下簡稱亞洲衛星有限公司)係亞洲著名之衛星公司,亞太衛星公司擁有之 APSTAR V 新衛星預定於 2003 年發射,而亞洲衛星有限公司擁有之 AsiaSat 4 新衛星預定於 2002 年發射,新加坡電訊於 90 年 1 月已租用亞太衛星公司之 APSTAR V 15 個 C 頻轉頻器並命名為 APSTAR V/ST-2。鑒於中新一號衛星轉頻器之使用率高於亞洲其餘衛星之平均值,本公司王副總經理金土博士乃指示規劃租用第二顆衛星,作為備援衛星及增強中新一號衛星客戶之信心。因此,為瞭解並吸取 APSTAR V 與 AsiaSat 4 之發展趨勢,衛星業務之營運策略與管理技術,據之以研擬本公司計劃租用第二顆衛星之投資評估報告及未來衛星經營策略及行銷計畫以迎合世界潮流,乃奉派至亞太衛星公司與亞洲衛星有限公司實地瞭解此二公司之營運策略及管理技術並蒐集 APSTAR V 與 AsiaSat 4 最新發展趨勢之資料。

本報告分為五章,第一章前言,第二章亞太衛星控股有限公司衛星 業務之營運管理,第三章亞洲衛星控股有限公司衛星業務之營運管理, 第四章租用第二顆新衛星之評估報告,第五章觀感與建議。

# 目 錄

|     |  | 頁次    |
|-----|--|-------|
| 第一章 | 前言   | 1     |
| 第二章 | 亞太衛星控股有限公司衛星業務之營運管理  | 3     |
| 壹、  | 公司簡介   | 3     |
| 貳、  | 營運管理   | 5     |
| 參、  | 參訪 APT Satellite Control Center 及 APT Telepark               | 6     |
| 第三章 | 亞洲衛星控股有限公司衛星業務之營運管理  | 9     |
| 壹、  | 亞洲衛星控股有限公司簡介   | 9     |
| 貳、  | 營運管理   | 1 1   |
| 第四章 | 租用第二顆新衛星之評估報告  | 1 4   |
| 壹、  | 探討本公司規劃租用第二顆新衛星  | 1 4   |
| 貳、  | 租用 AsiaSat 4、APSTAR V 之衛星特性分析                                | 1 4   |
| 參、  | 結論   | 1 6   |
| 第五章 | 觀感與建議  | 1 7   |
| 壹、  | 觀感   | 1 7   |
| 貳、  | 建議   | 1 8   |
| 附件  |  |       |
| 壹、  | APT Satellite Holdings Limited INTERIM REPORT 2001           |       |
| 貳、  | Asia Satellite Telecommunications Holdings Limited INTERIM R | EPORT |

2001

# 表目錄

|     |                                     | 負次  |
|-----|-------------------------------------|-----|
| 表 2 | 2.1亞太衛星公司衛星資料表                      | 4   |
| 表   | 3.1亞洲衛星有限公司衛星資料表                    | 1 0 |
| 表   | 3.2亞洲衛星有限公司 1999 年及 2000 年營收分類表     | 1 0 |
| 表   | 3.3AsiaSat 2 轉頻器使用率                 | 1 2 |
| 表   | 3.4AsiaSat 3S 轉頻器使用率                | 1 2 |
| 表   | 4.1AsiaSat 4 與 APSTAR V 衛星之特性分析     | 1 5 |
| 表   | 4.2就財務面分析租用 AsiaSat 4 與 APSTAR V 衛星 | 1 6 |
| 表   | 4.3就政策面分析租用 AsiaSat 4 與 APSTAR V 衛星 | 1 6 |

# 第一章 前言

此次奉派赴香港實習「衛星業務之營運管理」,其目的有下列二項:

- 1. 參訪亞太衛星公司(APT Satellite Telecommunications Ltd.)及亞 洲衛星有限公司(Asia Satellite Telecommunications Co. Ltd.) 等二家公司,以瞭解該二公司有關衛星業務之營運策略與管理技術。
- 2. 評估本公司向該公司之一租用新衛星之可行性。

亞太衛星公司與亞洲衛星有限公司為亞洲地區著名之衛星公司,各擁有三顆在軌衛星。早在中新一號衛星於87年12月1日正式商業運轉之前,國內衛星中繼業者及若干衛星小型地面站業者,即已租用亞太衛星公司之APSTAR衛星或亞洲衛星有限公司之AsiaSat衛星,開展其衛星通信業務。新加坡電訊亦於90年1月租用亞太衛星公司之APSTARV之15個C頻轉頻器並命名為APSTARV/ST-2。

該二公司高層主管曾數次參訪本公司,並且明確表達希冀能與本公司有商務上來往的意願;又對本公司而言,中新一號衛星轉頻器之使用率已高於亞洲其餘衛星之平均值,亟需規劃租用新發射衛星之轉頻器數顆,作為中新衛星轉頻器之備接及後續市場之需求,以增強中新一號衛星客戶之信心;而亞太地區近期預定發射之衛星中,以亞太衛星公司擁有之 APSTAR V 及亞洲衛星有限公司擁有之 AsiaSat 4 兩顆衛星之特性,較符合本公司需求。鑒於此,乃奉派拜訪該二公司,以瞭解 APSTAR V 及 AsiaSat 4 兩顆衛星之最新發展趨勢,及該二公司有關衛星業務之營運策略與管理技術,據之以評估本公司租用第二顆衛星之可行性,並且實

地瞭解該二公司之營運策略及管理技術,以及蒐集市場資料,以作為本 公司之參考。

本案,經由亞太衛星公司及亞洲衛星有限公司二家公司之妥善安排 後,得以成行,詳細行程及工作項目如下:

- 1. 至亞太衛星公司瞭解衛星業務營運策略及管理
- 2. 至 APT Satellite Control Center 參觀訪問
- 3. 至亞洲衛星有限公司瞭解衛星業務之營運策略及管理

## 第二章 亞太衛星控股有限公司衛星業務之營運管理

## 壹、 公司簡介

一、亞太衛星控股有限公司(APT Satellite Holdings Limited)

亞太衛星公司於 1992 年開始運作,主要股東包括中國通信廣播衛星公司(China Telecommunications Broadcast Satellite Corporation)、中國航天科技集團公司(China Aerospace Science and Technology Corporation)、新加坡衛星私人有限公司(Singasat Pte Ltd)、航天科技衛星控股有限公司(CASIL Satellite Holdings Limited)、光華開發創業投資有限公司(Kwang Hua Development and Investment Ltd)。亞太衛星控股有限公司連同各附屬公司合稱為「本集團」,該集團於 1996年分別在香港及美國紐約上市,目前員工約 20 餘人。

該集團擁有如表 2.1 所示的三顆衛星以提供多元化服務,內容包括:轉頻器租賃服務、衛星電視廣播及上鏈服務、媒體後期製作服務、二十四小時廣播監測服務、電信服務(包括 VSAT)及衛星 IP 骨幹網際網路服務。

APSTAR II R 衛星大部分轉頻器已於 1999 年租予 Loral 衛星公司,合約金額約為美金貳億柒仟參佰萬元,截至 90 年 8 月止,APSTAR I 與 I A 的平均出租率為 64.65%,APSTAR II R 的出租率則為 100%(轉租 Loral 公司),2000 年稅前盈餘為港幣 5 分,APSTAR I 的顧客有 Di sney、MGM、Reuters、HBO、CNNI、TNT、ESPN、CETV Hong Kong、印尼電視台與博新。APSTAR I A 的顧客則有 CCTV-1、2、7、大陸 CETV、貴陽電台、成都電

台、濟南電台、新疆電台、杭州電台、拉薩電台、 MGM 及菲 TPBGI 等。 上兩顆衛星目標客戶多為廣播電視業者。

衛星轉頻器容量 衛星功率 衛星 經度 衛星 衛星 提供服 Ku 頻 平台 C頻段 名稱 (Eas C 頻段 Ku 頻段 務 段 t) APSTAR-138 24x36MH > 34 通信、電 HS-376 Ι dBW 視、數據 APSTAR-通信、電 134 > 34 24x36MH HS-376 dBW I A 度 視、數據 15x54MH 27x36MH 通信、電 FS-130 76. 5 >35. 5 >48.5 APSTAR-視、IP、 1 x dBW dBW  $\Pi R$ 0 度 1x30MHz 數據 36MHz

表 2.1 亞太衛星公司衛星資料表

二、亞太衛星電訊有限公司(APT Satellite Telecommunications Limited)

亞太衛星電訊有限公司是亞太衛星控股有限公司與新加坡衛星私人有限公司於2000年6月共同合資聯營之企業,於2000年6月19日獲得香港特別行政區發出「以衛星基礎的對外電訊設施服務執照(the Satellite-based Fixed Telecommunication Network Services, FTNS License)」,提供對外電訊服務,包括批發電訊服務(Wholesale Telecom Services),衛星小型地面站服務(VSAT),網際網路路由交換中心 (Internet POP Gateway),設施管理(Facility Management Services)。於2001年1月3日獲得香港特別行政區發出「以海纜基礎的對外電訊設 施服務意向書(The Letter of Intent of the Cable-based FTNS)」,

已陸續開展對外電訊服務,目前員工為15人。

該公司除擁有母公司之衛星資源外並投資下列海纜:

- APCN-2 (Asia Pacific Cable network 2) 1x STM1(155 Mbps)
- C2C Cable Network & i2i Cable Network 8X STM1(1240 Mbps)
- EAC Cable Network 1X STM1(155 Mbps) •

預期 C2C 及 APCN-2 海纜對外固網服務可分別於 2001 年 12 月中旬及 2002 年第二季投入服務。亞太衛星電訊為配合其業務發展,正投資 四億港幣於大埔工業區興建電訊埠(APT Telepark),比鄰亞太衛星控制中心。

## 貳、營運管理

### 一、 業務環境

由於 2001 年上半年全世界經濟不景氣,對亞太地區廣播業務及電訊業務有負面影響,亞太地區轉頻器需求更形遲緩。在此形勢下,衛星轉頻器市場競爭更趨激烈。此乃是各衛星經營者所面臨的共同難題,然而亞太衛星集團卻以:「經過管理階層和員工共同努力,衛星出租率在上半年維持穩定,同時將努力克服種種不利因素,大力加強開拓業務,並尋找新的發展機會。」克服困境。

## 二、企業策略和發展方向

亞太衛星集團為面對目前之重大挑戰及維持其增長動力,管理階層於 2001 年 6 月下旬委聘顧問公司,就世界經濟不景氣之環境及該集團本身狀況進行檢討分析,並就未來發展的企業策略和發展方向提

供建議,對釐定該集團發展策略和方向頗具參考價值。

該集團正重新釐定公司企業及業務策略,重點包括:

- 繼續擴充衛星容量以服務客戶。
- 透過網際網路骨幹業務以擴充衛星轉頻器租賃業務區域,以取得業務之成長。
- 加強廣播及上鏈服務以設立廣播平台,以達成「熱鳥效應」。
- 透過衛星及海纜提供多元化的對外電訊服務。
- 擴充在價值鏈之位置及拓展與衛星相關的新業務以向用戶端靠攏。
- 在衛星相關的行業內組成戰略伙伴、聯盟、合營企業或重組以尋求高成長業務之機會。

#### 三、市場拓展

在釐定發展策略和市場定位後,亞太衛星集團將積極審慎拓展與 衛星業務相關的新業務,例如衛星電視廣播服務、網際網路骨幹服 務、數據廣播等。同時積極研究和探討透過業務和結構重組而使該集 團擴充業務領域的可行性。

## 冬、冬訪 APT Satellite Control Center 及 APT Telepark

一、 參訪 APT Satellite Control Center

APT Satellite Control Center 位於香港大埔工業區,占地1,765 sqm,由約40位具有經驗的衛星通信專家及工程師,24小時值班以

控制及監測在靜止軌道上之亞太衛星。

- 本 Center 可 24 小時操作 6/4 GHz(C-Band)與 14/12
   GHz(Ku-Band)來執行追蹤、遙測、指揮與通信監測。
- 目前有6座天線在運作: C-Band(13m、5.5m、11m、6.1m、9m)

  Ku-Band (8.1m)
- 第二期衛星控制中心及全新數據中心

新衛星控制中心的總投資額為2億港元,總樓面面積約達58,000 平方,呎,正全面加緊興建中,該中心將用作APSTAR V衛星的遙測、 追蹤、指揮中心,並容納3座大型衛星天線。此外該中心還特別配 置一個14,700平方呎全新數據中心。

## 二、 參訪 APT Telepark

正在興建中之APT Telepark 比鄰亞太衛星控制中心總部,係亞 太衛星電訊有限公司投資四億港元所發展之一先進的電訊基礎建 設,以提供專業的設施管理中心,預定可於2002年中建成,連接4 係香港固網服務商提供的光纖,透過人造衛星及海底電纜,將可提供 不同的電訊服務,將中國及亞洲各國,與北美及歐洲連接起來。

亞太衛星電訊總裁 Mr. Richard Lau 曾於 90 年 3 月專程前來本公司介紹其 APSTAR V及 APT Telepark,強調該 Telepark 可作為本公司 Hub Extension,所以特為本公司保留第三層樓之 rack,供本公司置放 Teleport 所需設備之用。經此 Teleport 本公司可提供技術支援服務,其優勢為不但可對多元之香港本地固網、國際海纜及衛星業

者提供技術支援及服務,並且可連接至中國大陸主要的電信 Gateway。

- Telepark 提供電腦及通訊系統的安置、支援及管理服務。
- 占地 74,000 平方呎,樓面面積 180,000 平方呎,其中包括一個約占 118,000 平方呎的數據中心。
- 衛星通訊:Telepark 將連接至世界各國多個衛星。

### → 海纜

C2C: Telepark 內將設一個 C2C 網路作業中心,負責 24 小時管理及運作 C2C 海纜,預期於 2001 年 12 月中旬建成之 C2C 網路,可連結亞洲多國,包括菲律賓、香港、台灣、中國大陸、韓國、日本及新加坡。

APCN2: 亞太衛星電訊亦投資興建 APCN2 網路,該網路直駁至 Telepark,並預期可於 2001 年第三季正式啟用。

● Telepark 中所有基建服務均有雙重保險以避免單點失誤,所 有與國際電訊路由及本地網路的連接都有分散的路徑。

# 第三章 亞洲衛星控股有限公司衛星業務之營運管理

壹、亞洲衛星控股有限公司(Asia Satellite Telecommunications Holdings Limited)簡介

亞洲衛星控股有限公司是在百慕達註冊成立之有限公司,在香港及美國紐約證券交易所上市,亞洲衛星有限公司(Asia Satellite Telecommunications Company Limited, AsiaSat)係亞洲衛星控股有限公司全資附屬公司。亞洲衛星有限公司成立於1988年,是亞洲第一家私人擁有之地區性衛星經營者,兩個主要股東為中國國際信託投資公司(China International Trust and Investment Corporation, CITIC)及歐洲衛星公司(Societe Europeenne des Satellites, SES), CITIC 擁有股份為34.13%, SES 擁有34.13%的股份,公眾則擁有31.05%的股份。該公司共有三顆衛星: AsiaSat 1、 AsiaSat 2、 AsiaSat 3S(詳如表3.1),以提供服務予廣播電視與電信經營商。目前,全球已有超過50個公眾與私人電視廣播業者使用亞洲衛星系統,提供100多個類比與數位電視頻道及90多個廣播頻道,在亞太地區估計有超過3億的收視戶,也有很多電信業者使用亞洲衛星系統提供公眾電話網路、私人 VSAT 網路、高速網際網路與多媒體服務等。

表 3.1 亞洲衛星有限公司衛星資料表

|               |                      | 衛星               | 衛星轉頻                         | <b>預器容量</b>   | 衛星功   | 率         |                 |
|---------------|----------------------|------------------|------------------------------|---------------|-------|-----------|-----------------|
| 衛星<br>名稱      | 衛星<br>平台             | 經度<br>(Eas<br>t) | C頻段                          | Ku 頻段         | C頻段   | Ku 頻<br>段 | 提供服務            |
| AsiaSat<br>-1 | Boein<br>g 376       | 122<br>度         | 24x36MH<br>z                 |               | 38dBW |           | 通信、電視、<br>數據    |
| AsiaSat<br>-2 | LM-70<br>00          | 100.<br>5 度      | 20x36MH<br>z<br>4 x<br>72MHz | 9 x<br>54MHz  | 40dBW | 53dBW     | 通信、電視、<br>數據    |
| ACIONT        | Boein<br>g 601<br>HP | 105.<br>5 度      | 28x36MH<br>z                 | 16 x<br>54MHz | 41dBW | 54dBW     | 通信、電視、<br>IP、數據 |

2000 年營收為港幣玖億玖仟柒佰萬元,每股盈餘為港仙 73,表 3.2 為依據業務範圍及客戶、地區分類資料:

表 3.2 亞洲衛星有限公司 1999 年及 2000 年營收分類表

| 業務範圍    | 1999(%) | 2000(%) |
|---------|---------|---------|
| 廣播      | 63. 0   | 70. 7   |
| 電信      | 37. 0   | 29. 3   |
|         | 100.0   | 100.0   |
| 客戶/地區   |         |         |
| STAR TV | 17. 2   | 22. 9   |
| 中國大陸    | 34. 6   | 20. 4   |
| 其他      | 48. 2   | 56. 7   |
|         | 100. 0  | 100.0   |

亞洲衛星有限公司堅持高品質高價位政策,目前投資香港寬頻網路公司 SpeedCast 36.5%的股權,1999年也取得香港政府上鏈、固定通信網路與 VSAT 執照,公司朝多媒體方向發展。於2001年6月30日,該集團有78名全職僱員,並認為人力資源是該集團其中一項最珍貴的資產。

## 貳、營運管理

## 一、業務環境

2001 年上半年,亞洲轉頻器市場整體需求下跌,亞洲衛星有限公司表示:「我們相信在很大程度上是因為全球經濟不景氣所致,鑒於前景持續不明朗,現有廣播及電訊經營商均無意擴展業務,又或將業務縮減,直至看到經濟出現復甦為止。」該集團預期其 2001 年業績將難望成長,甚至無法維持 2000 年的水準。然而,董事會對未來前景充滿信心,並認為該集團已準備就緒,可以把握經濟復甦所帶來的機會。

## 二、公司策略

該公司的策略是擴大其衛星傳送服務之核心業務收益;並同時開拓 與衛星有關的新成長行業的融合機會。

### 三、訪談紀要

承蒙亞洲衛星有限公司劉總經理小梅女士暨戚經理國安先生撥冗回 答下列問題:

(一)截至2001年6月30日AsiaSat 2轉頻器使用率為何下降,您認 為將來如何增加使用率?

- 答:1. AsiaSat 2轉頻器之使用率下降,主要原因是一些客戶不再續 約租用轉頻器,或是客戶由類比(analogue)傳送轉為數位 (digital)傳送。
  - 採取一項策略,即對一些本身已具策略性的租約給予短期的價格下調。

註:表 3.3 與 3.4 分別為 AsiaSat 2 與 AsiaSat 3S 於 2000 年 12 月 31 日與 2001 年 6 月 30 日之轉頻器使用率。

表 3.3 AsiaSat 2 轉頻器使用率

| AsiaSat 2 | Dec. 31, 2000 | June 30, 2001 |
|-----------|---------------|---------------|
| C-band    | 68%           | 58%           |
| Ku-band   | 66%           | 63%           |
| 0veral1   | 67%           | 59%           |

表 3.4 AsiaSat 3S 轉頻器使用率

| AsiaSat 3S | Dec. 31, 2000 | June 30, 2001 |
|------------|---------------|---------------|
| C-band     | 95%           | 94%           |
| Ku-band    | 3%            | 31%           |
| Overall    | 62%           | 71%           |

## (二)亞洲地區轉頻器之供應情況如何?

答:亞洲地區轉頻器容量持續供過於求,尤其是 Ku 頻段轉頻器方面,致 市場競爭愈趨激烈,造成價格下跌壓力增加。鑒於預期這種情況只 屬短暫性,亞洲衛星有限公司不會跟隨其他衛星業者將價格下調至現有價位,並積極維持較一般價位略高的價格。雖然無法避免受到壓力,但亞洲衛星有限公司採取一項「對一些本身已具策略性的租約,給予短期的價格下調」策略。

- (三)全世界普遍舖設光纜對衛星/亞洲衛星有限公司有何衝擊?
- 答:本公司的衛星策略地位位於亞洲上空,主要服務一些缺乏優質電訊設施的地區,故不會與海底電纜或陸地光纜競爭。其實,衛星的應用愈趨普及,原因是衛星可在同一時間,向其所覆蓋的服務範圍裡的每一個接收點傳送資訊,因此較地面光纜系統更為優勢。該等應用包括將電視節目和多媒體內容直接傳送給用戶或當地的分銷網路。預料亞太地區在這方面之應用會有大幅成長,因而刺激對衛星轉頻器容量的需求。

# 第四章 租用第二顆新衛星之評估報告

此行赴香港除至亞太衛星公司暨亞洲衛星有限公司實習衛星業務之 營運策略與管理技術外,另一重點為蒐集該二公司近期預定發射之 APSTAR V與 AsiaSat 4 最新發展趨勢之資料,以掌握新發射衛星之最新 資訊,俾製作租用新衛星之評估報告

## 壹、 探討本公司規劃租用第二顆新衛星

新加坡電訊 90 年 1 月租用亞太衛星公司 APSTAR V 15 個 C 頻轉頻器 並命名為 APSTAR V/ST-2,基於作為備援及後續市場之需求。本公司衛 星事業處亦奉王副總經理金土博士之指示,正在規劃租用新發射衛星之 數個轉頻器。

依據收集到的衛星新技術及市場資料,就 AsiaSat 4(2002/05 發射)、Optus C1(2002early 發射)、APSTAR V(2003/02 發射)及 GE1-1A(2000 已發射)而言,因本公司預測市場需求為 X 個 C 頻及 X 個 Ext. C 頻,而Optus C1 及 GE1-1A 則僅有 Ku 頻,且尚未證實是否可在大陸落地,故目前以 AsiaSat 4 及 APSTAR V 之衛星特性較符合本公司需求。茲就該兩顆衛星,分析其技術、財務及政策面如貳中所示各表。

## 貳、 租用 AsiaSat 4、 APSTAR V 之衛星特性分析

一、茲以 AsiaSat 4 及 APSTAR V 兩顆衛星所作之技術面、財務面及政 策面之分析結果詳如下列各表。

表 4.1 AsiaSat 4 與 APSTAR V 衛星之特性分析

| 衛星特性    | AsiaSat 4 (2002/05<br>發射)     | APSTAR V (2003/02 發射)   |
|---------|-------------------------------|---|
| 軌道位置(東) | 122(台灣上方)                     | 138   |
| 波束覆蓋    | Asia, ME,<br>CIS, Australasia | China, India, S.Asia,<br>Australia, New<br>Zealand, Oceania, Hawaii |
| 轉頻器數量   | 28                            | C—28/Extend C—10  |
| 轉頻器頻寬   | 36                            | 36MHz x 34/54MHz x 2/<br>50MHz                                      |
| EIRP    | 39. 6dBW                      | 39dBW   |
| 仰角      | 60. 7°                        | 55. 4°  |
| 轉頻器功率   | 55W                           | C-53W/Extend C-60W  |

表 4.2 就財務面分析租用 AsiaSat 4 與 APSTAR V 衛星

| 1 1  | SIAR 5(價格因係密件,以<br>表示) | 會計處為中新<br>衛星轉頻器計<br>算之成本        |
|--|------------------------|---------------------------------|
| 財務<br>US\$XMillion/xpdr/year US<br>2)<br>36l<br>XM<br>需: | MHz ,                  | USXMillion(價<br>格因係密件,以<br>X表示) |

## 表 4.3 就政策面分析租用 AsiaSat 4 與 APSTAR V 衛星

|     | AsiaSat 4           | APSTAR V       |
|-----|---------------------|----------------|
| 北竺工 | 1)股東結構:中信公司、歐洲衛星公司、 | 1)股東結構:中廣衛、    |
| 政策面 | 公眾                  | 中國航天科技集團、      |
|     | 2)高階經營階層為美國、英國籍。    | SingTel、航天科技衛星 |
|     | 3)衛星在大陸可落地。         | 控股、光華創投。       |
|     |                     | 2)高階經營階層大部份    |
|     |                     | 為大陸籍。          |
|     |                     | 3)衛星在大陸可落地。    |

## 冬、 結論

- 一、就衛星特性及政策面而言,AsiaSat 4 優於 APSTAR V,然而其價格 US\$XMillion/xpdr/year 甚為昂貴。
- 二、與AsiaSat 4 相較,如租斷 APSTAR V 之 2 個 C-Band(Ext.) 36MHz, 價格 US\$XMillion/xpdr 較便宜。然其「輸出許可証」尚未獲美國 政府核准是一隱憂。

# 第五章 觀感與建議

此行赴香港實習衛星業務之營運策略與管理技術,暨瞭解近期將發射之APSTAR V與AsiaSat 4新衛星最新發展趨勢資料,獲得下列幾點觀感與建議:

### 壹、觀感

- 一、在中新一號衛星87年12月1日正式商業運轉前,國內衛星中繼業者以及若干衛星小型地面站業者,已使用 APSTAR 以及 AsiaSat 衛星推動其業務,所以本公司與亞太衛星公司及亞洲衛星有限公司在業務關係往來上,可說是亦敵亦友,既為合作夥伴亦為競爭對手。因為目前在亞太衛星轉頻器供過於求之競爭激烈市場上,該二公司是本公司的強勁對手,然此行能承蒙該二公司主管之鼎力安排行程,在未涉及業務機密方面在訪談上都能詳盡回答,收穫頗多,非常感謝。
- 二、本公司在「宏觀衛星電視頻道節目傳送海外」案係租用 AsiaSat 2, 另在兩岸衛星專線電路業務上,已有一案使用 APSTAR 1。目前該 二公司均亟力向本公司行銷其預定新發射之衛星,而亞太衛星公司 亦亟力向本公司行銷其正興建中之 APT Telepark,故該二公司在 亞太衛星轉頻器市場雖為本公司強勁對手,但亦有可能成為本公司 在衛星相關行業內之合作夥伴,似可積極尋求各種合作機會,以共 同尋求高成長業務的機會。

## 貳、建議

- 一、中國大陸於 2001 年 12 月 11 日加入世界貿易組織(WTO),意味大部份電信市場均得開放成為自由競爭市場,然目前依據大陸投資及營運相關規定中「電信業務開放方式」,並未列出衛星業務之開放時間、地區與外資上限。亞洲衛星有限公司在大陸地區之營業額於2000 年係佔其總營業額之 20.4%,亞太衛星公司在大陸地區之營業額於2001 年 1 月 1 日至 6 月 30 日止係佔其總營業額之 72%。因此,本公司衛星業務從近程經營兩岸衛星專線電路服務台商始,自中程以策略聯盟方式經營兩岸或大陸之 VSAT、衛星遠距教學、直播衛星業務等,需密切注意該二公司在大陸地區之經營業務脈動,以為本公司拓展大陸衛星業務參考。
- 二、 在租用新衛星之評估報告方面,曾向該二公司主管請教「如以本公司股票交換租斷其新衛星轉頻器之可行性」,亞洲衛星有限公司表示「在發射新衛星上,因該公司資金充裕,此交叉轉換持股觀念對其股東可能吸引力不是很大,然如能以一半股票,一半資金方式租用衛星轉頻器,似是可行。」未來本公司在股票釋出政策上,如有採交叉轉換持股方案,似亦可以此方向規劃。



# Whillyout Boundaries

## Chairman's Statement

The Board of Directors (the "Board") of APT Satellite Holdings Limited (the "Company") are pleased to announce the unaudited interim results of the Company and its subsidiaries (the "Group") for the six months ended 30 June 2001.

The interim financial report has been reviewed by the Company's audit committee and the auditors.

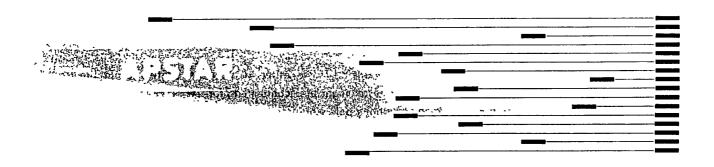
#### ■ RESULTS ■

The Group's turnover and consolidated net profit attributable to shareholders amounted to HK\$187,831,000 (2000: HK\$163,095,000) and HK\$52,882,000 (2000: HK\$29,597,000) respectively. Earnings per share was HK12.81 cents (2000: HK7.05 cents), representing an increase of 82% over the same period in 2000.

#### ■ INTERIM DIVIDEND

In line with the need of Group's future development, the Board has resolved not to declare an interim dividend for the six months ended 30 June 2001 (2000: HK5 cents per share).

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APT Satellite Holdings Limited

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## CONDENSED CONSOLIDATED INCOME STATEMENT

For the six months ended 30 June 2001

# For the six months ended 30 June

|   |       | 2001        | 2000           |
|---|-------|-------------|----------------|
|   | Notes | HK\$'000    | HK\$'000       |
|   |       | (Unaudited) | (Unaudited)    |
|   |       |             |                |
| Turnover  | 3     | 187,831     | 163,095        |
| Cost of services                                |       | (129,068)   | (130,188)      |
|   |       |             |                |
|   |       | 58,763      | 32,907         |
|   |       |             |                |
| Other revenue                                   |       | 48,049      | 39,683         |
| Administrative expenses                         |       | (29,481)    | (19,646)       |
| ı   |       |             |                |
| Profit from operations                          |       | 77,331      | 52,944         |
| Finance costs                                   |       | (5,644)     | (8,446)        |
| Share of results of jointly controlled entities |       | (1,892)     | (9)            |
|   |       |             |                |
| Profit before taxation                          |       | 69,795      | 44,489         |
| Taxation  | 5     | (16,913)    | (14,892)       |
|   |       |             |                |
| Net profit attributable to shareholders         |       | 52,882      | 29,59 <i>7</i> |
|   |       |             |                |
| Interim dividend                                | 6     | _           | 20,805         |
|   |       |             |                |
| Earnings per share                              | 7     |             |                |
| - Basic   |       | 12.81 cents | 7.05 cents     |
|   |       |             |                |
| - Diluted                                       |       | 12.80 cents | N/A            |
|   |       |             | , ,,,          |

There were no recognised gains or losses other than the net profit attributable to shareholders. Details of the restatement of accumulated profit as at 31 December 2000 arising from change in accounting policy on proposed dividend are set out in note 2.











# CERTAIN DOWN THE WALL

## CONDENSED CONSOLIDATED BALANCE SHEET

At 30 June 2001

|  |       | 30.6.2001   | 31.12.2000   |
|--|-------|-------------|--------------|
|  | Notes | HK\$'000    | HK\$'000     |
|  |       | 1           | (Audited and |
| •  |       | (Unaudited) | Restated)    |
|  |       | (Onaddited) | ( Restated)  |
| NON-CURRENT ASSETS                         |       | 1           |              |
|  | •     |             |              |
| Investment property                        | 8     | 2,425       | -            |
| Property, plant and equipment              | 8     | 1,065,921   | 1,101,868    |
| Interests in jointly controlled entities   |       | 54,803      | 22,428       |
| Pledged bank deposits                      |       | 349,519     | 379,668      |
| Club memberships                           |       | 5,537       |              |
| ciuo membersinps                           |       | 3,337       | 5,537        |
|  |       | 1 470 005   | 1 500 501    |
|  |       | 1,478,205   | 1,509,501    |
| CLIDDELIT ACCETS                           |       | 1           |              |
| CURRENT ASSETS                             |       | 1           | }            |
| Trade receivables                          | 9     | 55,667      | 59,928       |
| Deposits, prepayments and other receivable | es    | 41,142      | 33,551       |
| Loans to a jointly controlled entity       | 10    | 46,500      | 46,500       |
| Tax recoverable                            |       | 1,424       | 1,424        |
|  |       | 1           |              |
| Pledged bank deposits                      |       | 58,469      | 65,641       |
| Bank balances and cash                     |       | 1,593,793   | 1,704,606    |
|  |       |             |              |
|  |       | 1,796,995   | 1,911,650    |
|  |       |             |              |
| CURRENT LIABILITIES                        |       |             |              |
| Other payables and accrued charges         |       | 72,948      | 73,288       |
| Rentals received in advance                |       | 19,008      | 20,111       |
| Dividend payable                           |       | 13,000      | 1 '          |
| Dividend payable                           |       | 1           | 2,400        |
| Tax payable                                |       | 67,246      | 56,425       |
| Bank borrowings due within one year        | 11    | 58,469      | 175,320      |
| Amount due to a related company            |       | -           | 1,709        |
|  |       |             | -            |
|  |       | 217,671     | 329,253      |
|  |       |             |              |
| NET CURRENT ASSETS                         |       | 1,579,324   | 1,582,397    |
|  |       |             |              |
|  |       | 3,057,529   | 3,091,898    |
|  |       |             |              |
| CAPITAL AND RESERVES                       |       |             |              |
| Share capital                              | 12    | 41,280      | 41,280       |
| Reserves                                   |       | 2,398,422   | 2,407,460    |
|  |       |             | 27.077.00    |
|  |       | 2,439,702   | 2,448,740    |
|  |       | 2,133,702   | 2,110,710    |
| NON-CURRENT LIABILITIES                    |       |             |              |
| Bank borrowings due after one year         | 11    | 349,519     | 379,668      |
| Danasta racciued                           |       |             |              |
| Deposits received                          |       | 43,578      | 25,852       |
| Deferred income                            |       | 100,059     | 114,112      |
| Deferred taxation                          |       | 124,671     | 123,526      |
|  |       |             |              |
|  |       | 617,827     | 643,158      |
|  |       |             |              |
|  |       | 3,057,529   | 3,091,898    |
|  |       |             | 1            |





# WITTER OUT BOUNDED 1.11.-

## CONDENSED CONSOLIDATED CASH FLOW STATEMENT

For the six months ended 30 June 2001

|  | HK\$'000<br>(Unaudited)                                |
|--|--|
| NET CASH INFLOW FROM OPERATING ACTIVITIES  | 125,788  |
| RETURNS ON INVESTMENTS AND SERVICING OF FINANCE Interest received Interest paid Dividend paid  | 58,047<br>(6,461)<br>(64,320)                          |
| NET CASH OUTFLOW FROM RETURNS ON INVESTMENTS AND SERVICING OF FINANCE  | (12,734)   |
| TAXATION  Hong Kong Profits Tax paid  Overseas tax paid  | (686)<br>(4,261)                                       |
| TAXATION PAID  | (4,947)  |
| INVESTING ACTIVITIES  Additions to property, plant and equipment  Proceeds on disposal of property, plant and equipment  Proceeds on disposal of property, plant and equipment to  a jointly controlled entity  Loan repayment from a jointly-controlled entity  Capital injection to a jointly-controlled entity  Decrease in pledged bank deposits | (88,632)<br>2<br>13,657<br>1,500<br>(35,768)<br>37,321 |
| NET CASH OUTFLOW FROM INVESTING ACTIVITIES   | (71,920)   |
| NET CASH INFLOW BEFORE FINANCING   | 36,187   |
| FINANCING Repayment of borrowings  | (147,000)  |
|  | (147,000)  |
| DECREASE IN CASH AND CASH EQUIVALENTS  | (110,813)  |
| CASH AND CASH EQUIVALENTS AT THE BEGINNING OF THE PERIOD   | 1,704,606  |
| CASH AND CASH EQUIVALENTS AT THE END OF THE PERIOD   | 1,593,793  |
| ANALYSIS OF THE BALANCE OF CASH AND CASH EQUIVALENTS  Bank balances and cash   | 1,593,793  |











## THE DUT BOUNDARIES !

#### NOTES TO THE CONDENSED FINANCIAL STATEMENTS

For the six months ended 30 June 2001

#### 1. BASIS OF PREPARATION

The condensed financial statements have been prepared in accordance with Statement of Standard Accounting Practice 25 "Interim Financial Reporting" ("SSAP 25") issued by the Hong Kong Society of Accountants (the "HKSA"), except that, in this first year of implementation of SSAP 25, as permitted by The Rules Governing the Listing of Securities on The Stock Exchange of Hong Kong Limited ("Listing Rules"), no comparative amounts have been presented for the condensed consolidated cash flow statement

#### 2. PRINCIPAL ACCOUNTING POLICIES

The condensed financial statements have been prepared under the historical cost convention, as modified for the revaluation of certain properties

The accounting policies adopted are consistent with those followed in the preparation of the Group's annual financial statements for the year ended 31 December 2000, except as described below.

In the current period, the Group has adopted, for the first time, a number of new and revised Statements of Standard Accounting Practice ("SSAP") issued by the HKSA. The adoption of these new or revised SSAPs has no material effect on the current or prior period financial statements except.

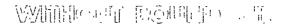
- In accordance with SSAP 9 (Revised) "Events after the Balance Sheet Date", dividends proposed or declared after the balance sheet date are not recognised as a liability at the balance sheet date, but are disclosed in the notes to the financial statements. This change in accounting policy has been applied retrospectively, resulting in a prior period adjustment. Proposed final dividend of HK\$61,920,000 included in the dividend payable in the consolidated balance sheet of the Group as at 31 December 2000 has been reversed and the restated accumulated profits carried forward from 31 December 2000 is HK\$612,467,000.
- SSAP 26 "Segment Reporting" has introduced new principles for reporting financial information by segment Segment disclosures for the six months ended 30 June 2000 have been presented in order to conform with the requirement of the standard
- SSAP 32 "Consolidated Financial Statements and Accounting for Investments in Subsidiaries" has introduced a new definition of subsidiary, which is an enterprise that is controlled by the Company. In prior year, an investment in an enterprise has been accounted for as subsidiary not consolidated as the Company indirectly holds more than half of the issued share capital but does not control the composition of the board of directors. As this enterprise is jointly controlled by the Company and the other shareholder, it is no longer a subsidiary under SSAP 32. This has resulted in a reclassification of the investment from a subsidiary not consolidated to a jointly controlled entity. Comparative amounts have been adjusted retrospectively.











### NOTES TO THE CONDENSED FINANCIAL STATEMENTS (CONTINUED)

#### 3. SEGMENTAL INFORMATION

The Group only has one business segment, namely the maintenance and operation of satellite telecommunication systems

The Group's geographical segment analysis of turnover by location of customers is as follows

# For the six months ended 30 June

Hong Kong
Other regions in the People's Republic of China
United states of America
Singapore
Others

| 2000     |
|----------|
| HK\$'000 |
|          |
| 8,048    |
| 128,899  |
| 11,387   |
| -        |
| 14,761   |
|          |
| 163,095  |
|          |

A segment analysis of result by location of customers has not been presented as substantially all costs are central in nature and do not directly relate to provision of services to individual location

#### 4. DEPRECIATION

During the period, depreciation of HK\$108,460,000 (2000 HK\$108,226,000) was charged in respect of the Group's property, plant and equipment

#### 5. TAXATION

# For the six months ended 30 June

| 2001     | 2000            |
|----------|-----------------|
| HK\$'000 | HK\$'000        |
|          |                 |
|          |                 |
|          |                 |
|          |                 |
| 2,934    | 1,798           |
|          |                 |
| 12,833   | 11,862<br>1,232 |
| 1,146    | 1,232           |
|          |                 |
| 16,913   | 14,892          |

The charge comprises

Hong Kong Profits Tax calculated at 16% of the estimated assessable profit for the period

Overseas tax calculated at rates prevailing in respective jurisdictions

Deferred taxation











# LANGE BOUNDARIES !

### NOTES TO THE CONDENSED FINANCIAL STATEMENTS (CONTINUED)

#### 6. DIVIDENDS

On 22 June, 2001, a dividend of HK15 cents per share was paid to shareholders as the final dividend for 2000.

In line with the need of Group's future development, the Board has resolved not to declare an interim dividend for the six months ended 30 June 2001 (2000 HK5 cents per share)

### 7. EARNINGS PER SHARE

The calculation of the basic and diluted earnings per share is based on the following data

# For the six months ended 30 June

| 2001     | 2000     |
|----------|----------|
| HK\$'000 | HK\$'000 |
|          |          |
|          |          |
|          |          |
|          |          |
|          |          |
|          |          |
| 52,882   | 29,597   |
|          |          |
| ′000     | ′000     |
|          |          |
|          |          |
|          |          |
|          |          |
|          |          |
| 412.000  | 420.000  |
| 412,800  | 420,000  |
|          |          |
| 282      |          |
|          |          |
|          |          |
|          |          |
| 413,082  |          |

#### Earnings

Earnings for the purposes of calculating basic and diluted earnings per share (net profit for the period)

#### Number of shares

Weighted average number of ordinary shares for the purposes of calculating basic earnings per share

Effect of dilutive share options

Weighted average number of ordinary shares for the purposes of calculating diluted earnings per share









APT Satellite Holdings Limited

# WINDOW REAL TO WINDOW THE PARTY

## NOTES TO THE CONDENSED FINANCIAL STATEMENTS (CONTINUED)

## 8. ADDITIONS TO INVESTMENT PROPERTY AND PROPERTY, PLANT AND EQUIPMENT

During the period, the Group reclassified a property situated in the PRC from leasehold land and buildings to investment property at a carrying value of HK\$2,425,000

In addition, the Group spent HK\$88,632,000 on additions to property, plant and equipment during the period

#### 9. TRADE RECEIVABLES

The Group allows an average credit period of 0 – 10 days to its trade customers. The following is an aged analysis of trade receivables at the balance sheet date

| Not yet due                |
|----------------------------|
| Overdue 0 - 30 days        |
| Overdue 31 - 60 days       |
| Overdue 61 - 90 days       |
| Overdue 91 – 120 days      |
| Overdue more than 120 days |

| 30.6.2001 | 31 12 2000 |
|-----------|------------|
| HK\$'000  | HK\$'000   |
|           |            |
| -         | 1,707      |
| 35,731    | 37,370     |
| 2,465     | 6,327      |
| 12,336    | 747        |
| 142       | 9,534      |
| 4,993     | 4,243      |
|           |            |
| 55,667    | 59,928     |

## 10. LOANS TO A JOINTLY CONTROLLED ENTITY

The loans granted to a jointly controlled entity are unsecured. An outstanding loan balance of HK\$1,240,000 is interest-free for the first six months from the date of the advance and thereafter bears interest at 6% per annum and is repayable in 2005. Another loan amounting to HK\$6,200,000 is interest free and is also repayable in 2005. Other loan amounting to HK\$46,500,000 bear interest at 8.25% per annum and is repayable in 2001.

#### 11. BANK BORROWINGS

During the period, the Group repaid bank loans of approximately HK\$147 million

#### 12. SHARE CAPITAL

There were no movements in the share capital of the Company in either the current or the prior interim reporting period







# THE PURE BOUNDARIES !

### NOTES TO THE CONDENSED FINANCIAL STATEMENTS (CONTINUED)

#### 13. CONTINGENT LIABILITIES

In the years before 1999, overseas withholding tax was not charged in respect of the Group's transponder lease income derived from the overseas lessees. From 1999, overseas withholding tax has been charged on certain transponder lease income of the Group and full provision for such withholding tax for the years from 1999 has been made in the financial statements. The Directors of the Company are discussing with the relevant tax authority on whether the transponder lease income of the Group earned before 1999 is subject to the new withholding tax rule. The Directors of the Company are of the opinion that the new tax rules should take effect from 1999 and, accordingly, no provision for the withholding tax in respect of the years before 1999 is necessary. The Group's withholding tax in respect of 1998 and before, calculated at the applicable rates based on the relevant transponder lease income earned in those years, not provided for in the financial statements amounted to approximately HK\$65,198,000

#### 14. CAPITAL COMMITMENTS

At 30 June 2001, the Group had authorized but not contracted capital commitments of HK\$306,829,000 and contracted but not provided for capital commitments of HK\$1,388,549,000 in respect of the procurement and launch of a new satellite APSTAR V

Also, the Group's share of the capital commitments of the jointly controlled entities not included in the above are as follows:

Authorised but not contracted

Contracted but not provided for in the financial statements

Total commitments

| 30.6.2001 | 31 12 2000 |  |
|-----------|------------|--|
| HK\$'000  | HK\$'000   |  |
|           |            |  |
| 103,582   | 6,274      |  |
| 22,983    | 21,157     |  |
|           |            |  |
| 126,565   | 27,431     |  |

#### 15. RELATED PARTY TRANSACTIONS

During the period, the Group entered into the following significant transactions with related parties in relation to the APSTAR V project

For the six months ended 30 June

| enueu    | 30 Julie |
|----------|----------|
| 2001     | 2000     |
| HK\$'000 | HK\$'000 |
| 1,560    | -        |
| 46,722   | _        |

Services fee to a shareholder of the Company (Note 1)

Services fee to a fellow subsidiary of a shareholder of the Company (Note 1)

Note:

(i) The directors consider that the services fees were charged according to prices and conditions similar to those offered to other customers by the launch services provider









# Management Discussion and Analysis

#### **BUSINESS REVIEW**

The Group's three in-orbit satellites, together with other corresponding telemetry, tracking and control systems were well-rendered during the first six months of this year. The average leasing rate of the APSTAR I and the APSTAR IA was 62 65% and APSTAR IIR was 100% respectively

#### **Business environment**

It was a worldwide slowing down of the economy during the first half of the year, which impacted adversely all broadcasting and telecommunications businesses in the Asia Pacific region. Demand for transponders in the Asia Pacific region was even weaker. Under such circumstance, competition became rife in the satellite transponders market as each satellite operator has to confront. However, with management and staff concerted efforts at the Company, the satellite leasing rate remained stable for the first half of the year. At the moment, the Company continues its best efforts to overcome unfavorable factors, strengthen its business expansion programs and keep searching for new business opportunities.

#### APSTAR V satellite

To implement a replacement satellite for the APSTAR I, the Group signed the Procurement and Launch Service Agreements for the APSTAR V in January 2001. Total project investment will be approximately US\$230 million. It is expected the APSTAR V will be launched during mid-2003. The satellite supplier is in the process of commissioning construction.

#### APSTAR VB satellite

At the same time, the Group has approached each satellite supplier in July this year, inviting them to tender for the APSTAR VB. The APSTAR VB will function as the backup to APSTAR V. It will also be the replacement satellite for the APSTAR IA, should the need arise.

## Satellite Control Center Phase II and the New Data Center

Total investment cost for the Satellite Control Center Phase II, for which construction is now smoothly under way, amounts to approximately HK\$200 million. With a total site area of approximately 58,000 square feet, this new satellite center is specially designed for the telemetry, tracking and command center for the APSTAR V. The center will also accommodate three large satellite antennae and, in addition, houses a New Data Center with an area of 14,700 square feet. The Group has already secured a customer and it is expected that the New Data Center would bringforth income upon its inauguration at the end of this year

## Satellite television broadcasting services

With dedicated efforts during the first half of the year, the Group marked a significant improvement to its satellite television broadcasting services. It supplemented four additional channels and the number of satellite television broadcasting services channels has increased to five over the period, thus paving the way to the establishment of a satellite television broadcasting platform.





# FAMILY ALL BOMBLEVINES 6

### External telecommunications services

After APT Satellite Telecommunications Ltd., a joint venture of the Group, was granted the satellite-based external fixed telecommunication network services license and a Letter of Intent for the submarine cable external fixed telecommunication network services, the joint venture is progressively becoming involved in external telecommunications services. It is projected that the C2C and APCN2 electronic cables for external Fixed Telecommunication Network Services will commence operation by December 2001 and the second quarter of 2002 respectively. The Group is now in full gear in its construction of a comprehensive Telepark, which is located next to the Group's Satellite Control Center. The Telepark is expected to be operational by the second half of 2002, further expanding the Group's telecommunications business.

#### 亞訊通信技術開發(深圳)有限公司

To cope with the needs for China Market development, the Group founded APT Communication Technology Development (Shenzhen) Co , Ltd. "亞訊通信技術開發 (深圳) 有限公司" in Shenzhen, a wholly-owned subsidiary of the Group and foreign enterprise, at a total investment cost of HK\$7.10 million. Its business scope is mainly to engage in the technological development of telecommunication facilities, telecommunication network systems and computer software. It has been given the go-ahead from the foreign enterprise approval authority to begin operation.

#### **Business prospect**

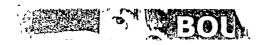
It is expected that the worldwide economy will continue to be depressed during the second half of the year. In this respect, the overall atmosphere of any broadcasting and telecommunications business remains stagnant. Market conditions will therefore become even more competitive. Under such unfavourable conditions, the Group's stance for forthcoming challenges lies in caution not prudent. However, the Group is focused and will be prepared for future growth and development opportunities.

## The development of the APSTAR V and APSTAR VB

The Group is closely monitoring Space Systems/Loral Inc. in its construction and eventual shipment of the APSTAR V, keeping in mind its launching during 2003. The Group will also be actively engaging in any tendering activities for APSTAR VB. Close contact is being kept with the manufacturer and launcher and insurance companies for analyses and comparisons. In addition, the Group is dedicating its efforts in the study of various marketing campaigns, preparing promotional materials and actively participating in exhibitions and seminars in the industry for the soon to be launched ATSTAR V.

#### Corporate strategy and prospect

To cope with present difficulties which the Group is facing and in looking for growth and expansion, in late June the management of the Company employed the services of a consulting firm. Its specific role involves reviewing and conducting analyses on the present status of the Group against the foreseeable worldwide economic backdrop. This consulting company has drawn up a proposal in respect of corporate strategy for the Group's future growth. This proposal is quite helpful for planning the Group's development strategy and prospect.







#### Market expansion

The Group is reviewing its development strategy and direction on an on-going basis. A significant growth is expected for the second half of 2001. Continuous efforts made during the first half of the year paid off in a gradual increase in sales. Its satellite leasing rate also remained stable. During August, the average leasing rate for the APSTAR I and APSTAR IA increased by 2 0%. Continuing efforts are being made for the second half of the year for achieving the full quota for the year

As corporate developmental strategies and market position become clear, the Group will be able to expand into satellite-related new projects, such as satellite television broadcasting services, Internet main-frame services and digital broadcasting. These will be pursued with focus and prudence. Further, the Group will also look into the feasibility of expanding its business scope through business and structural reorganization.

#### Liquidity and financial resources

The Group generally financed its operation with its internally generated cash flow from revenue. As at 30 June 2001, the Group had cash and bank balances of a total amount of approximately HK\$1.59 billion and net current assets of approximately HK\$1.58 billion

As at 30 June 2001, the Group's bank borrowings secured by time deposits amounted to approximately HK\$407 million bearing a fixed interest at 12% per annum. The Group has an unutilized credit facility for up to US\$10 million bearing an interest at LIBOR plus 0 95%. The group has also pledged certain properties of an aggregate total net book value approximately of HK\$8 million.

As of 30 June 2001, the Group's gearing ratio (total liabilities to total assets) decreased from 28% to 26% comparing with the ratio at the end of 2000

As at 30 June 2001, the Group has not used any instruments for hedging purposes as most of its transactions are being settled in United States dollar.

#### Human resources

The Group remunerates its employees chiefly in the light of their respective responsibilities and the current market practice in addition to the Share Option Scheme which was adopted on 22 May 2001 at the annual general meeting.

# Substantial Shareholder

As at 30 June 2001, according to the register required to be kept under Section 16(1) of the Securities (Disclosure of Interests) Ordinance ("SDI Ordinance"), the only shareholder with an interest of 10% or more of the issued share capital of the Company was as follow.

Shareholder Number of shares held

APT Satellite International Company Limited

214,200,000

Except as disclosed above, no person had registered an interest in the share capital of the Company that was required to be recorded under Section 16(1) of the SDI Ordinance.





## WITHOUT BOUNDARIES!

## Interests of Directors & Chief Executives'

#### ■ INTERESTS IN SHARES ■

As at 30 June 2001, the interests of the Directors and Chief Executives in the share capital of the Company as recorded in the register required to be kept under Section 29 of the SDI Ordinance were as follows:

| Chief Executive               | Nature of Interest | Number of shares held |
|-------------------------------|--------------------|-----------------------|
| Leng Yı Shun (Vice President) | Personal           | 500                   |

Except as disclosed above, none of the Directors, chief executives or their associates had any personal, family, corporate or other interests in the equity or debt securities of the Company, its subsidiaries or any of its associated corporations as defined in the SDI Ordinance as recorded in the register required to be kept under Section 29 of the SDI Ordinance as at 30 June 2001.

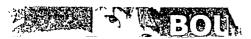
### ■ RIGHT TO ACQUIRE SHARES ■

Except for the share option scheme adopted on 22 May 2001 at the annual general meeting of the Company, at no time during the period was the Company, its substantial holding company or any of its subsidiaries a party to any arrangement to enable the Company's Directors, their respective spouse or children under 18 years of age to acquire benefits by means of the acquisition of shares in or debentures of the Company or any other body corporate

On 19 June 2001, a total of 14,650,000 share options were granted for a nominal consideration of HK\$1 per grantee pursuant to the terms and conditions of share option scheme (the "Scheme") approved on 22 May 2001 at the annual general meeting of the Company, under the Scheme the Board may at any time and from time to time, at their discretion invite any executive director or employee of the Group to take up options to subscribe for shares of the Company exercisable commencing from 22 May 2003 to 21 May 2011.

Particulars of share options held by the directors and chief executives as of 30 June 2001 are as follows:

| Name of<br>director and<br>chief executive               | Options<br>granted after<br>the adoption<br>of the Scheme<br>on 22 May 2001 | Options<br>Lapsed/<br>cancelled<br>during the<br>period | Options held at<br>30 June 2001 | Exercise period               | Exercise price<br>per share<br>HK\$ |
|--|---|---|---------------------------------|-------------------------------|-------------------------------------|
| Chen Zhaobin<br>(Executive Director<br>& President)      | 2,200,000   | -   | 2,200,000                       | 22 May 2003 to<br>21 May 2011 | 2 765                               |
| Cui Xinzheng<br>(Executive Director<br>& Vice President) | 1,200,000   | -   | 1,200,000                       | 22 May 2003 to<br>21 May 2011 | 2 765                               |
| Leng Yı Shun<br>(Vice President)                         | 1,500,000   | -   | 1,500,000                       | 22 May 2003 to<br>21 May 2011 | 2 765                               |
| Kwok Kah Wai, Victor<br>(Vice President)                 | 1,200,000   | -   | 1,200,000                       | 22 May 2003 to<br>21 May 2011 | 2 765                               |









# WITHOUT BOUNDAINED

# Purchase, Sales or Redemption of Shares

During the period, neither the Company nor any of its subsidiaries purchased, sold or redeemed any of the Company's listed securities

# **Code of Best Practice**

In the opinion of the Board, the Company has compiled with the Code of Best Practice as set out in Appendix 14 of the Rules Governing the Listing of Securities on The Stock Exchange of Hong Kong Limited throughout the period covered by the interim report, except that the non-executive Directors of the Company are not appointed for specific terms but are subject to retirement by rotation and re-election at the annual general meeting of the Company in accordance with the Bye-Laws of the Company.

# **Audit Committee**

The Audit Committee held a meeting on 29 August 2001 at which the Committee reviewed the unaudited Interim Financial Report of the Group for the six months ended 30 June 2001.

# **Appreciation**

On behalf of the Board, I would like to offer my sincere thanks to all our staff for their hardworking and commitment contributed to the Group.

Liu Ji Yuan Chairman

Xiamen, PRC, 17 September 2001



The Board announces the unaudited interim results of the Group for the six months ended 30th lune, 2001

The period under review saw the onset of the current global economic downturn, yet the Group was able to maintain a similar result as that achieved last year

In the longer term, we expect strong potential growth to materialise as confidence in the region's economies returns. Placed strategically over the Asian landmass, AsiaSat satellites do not compete with undersea cables, but serve areas generally lacking in quality telecommunications infrastructure increasingly, satellites are used for applications where they have inherent advantages over terrestrial cable systems because of their ability to reach, simultaneously, all points within their beams. These applications include the distribution of television and multimedia content either directly to the customers or to local distribution networks. The rapid growth expected throughout the Asia Pacific region for these applications will give rise to an increasing demand for satellite capacity. The Group is confident that it is well placed to capitalise on these emerging opportunities from a position of strength.

## INTERIM RESULTS

Turnover for the first half of 2001 decreased 7% to HK\$477 million (2000 HK\$513 million), due mainly to the comparative figure for 2000 including HK\$41 million from the 1996 sale of Ku-band transponders on AsiaSat 2, that was fully recognised at the end of May 2000. Had the HK\$41 million recognised in the year 2000 been excluded for the purpose of comparison, there would have been a marginal increase in the turnover for the first half of 2001 Profit attributable to shareholders also decreased 4% to HK\$274 million (2000 HK\$286 million), principally for the

#### CHANGES IN ACCOUNTING PRACTICE

In the current period, the Group has adopted, for the first time, a number of new and revised Statements of Standard Accounting Practice ("SSAP") issued by the Hong Kong Society of Accountants, which has resulted in the adoption of the following new/revised accounting policies.

# Dividends proposed or declared after the balance sheet date

In accordance with SSAP 9 (Revised) Events after the Balance Sheet Date, dividends proposed or declared after the balance sheet date are not recognised as a liability at the balance sheet date, but are disclosed as a separate component of equity in the notes to the financial statements. This change in accounting policy has been applied retrospectively, resulting in a prior period adjustment.

#### **Provisions**

In accordance with SSAP 28 *Provisions, Contingent Liabilities and Contingent Assets*, provisions are recognised when the Group has a present obligation as a result of a past event which it is probable will result in an outflow of economic benefits that can be reasonably estimated. Adoption of this accounting policy has resulted in the derecognition of provision for maintenance cost of transponders sold. This change in accounting policy has been applied retrospectively.

In prior years, the estimated future costs of maintaining the transponders sold under transponder purchase agreements, after the 50 months warranty period provided to the customers, were accrued on a straight line basis over the warranty period and were released to the income statement on a straight line basis over a period of 104 months.

Following the adoption of SSAP 28, the recognition of such provisions is no longer acceptable in the absence of a present obligation in respect of such costs. Therefore, provision for maintenance cost of transponders sold and retained earnings at 1st January, 2001 have been adjusted (see note 3 to the condensed financial statements). As allowed by SSAP 28, the Group has not adjusted the retained earnings at 1st January, 2000 and accordingly has not restated the comparative information on provision for maintenance cost of transponders sold.

# Segment reporting

In the current period, the Group has changed the basis of identification of reportable segments to that required by SSAP 26 Segment Reporting. Segment disclosures for the six months ended 30th June, 2000 have been amended so that they are presented on a consistent basis.

## DIVIDEND

In view of the Directors' confidence in the future of the Group, the Board has declared an interim dividend for 2001 of HK\$0.06 per share (2000: HK\$0.06). This dividend is payable on 20th November, 2001 to shareholders on the share register as of 18th October, 2001. The share register will be closed from 11th October, 2001 to 18th October, 2001, both days inclusive.

# **OPERATIONS REVIEW**

# Satellite fleet

During the period, the Group's satellites and systems continued to operate well and experienced no failures or disruptions.

#### **Transponder utilisation**

At 30th June, 2001, the overall utilisation rate for AsiaSat 2 was 59% (2000 73%) and for AsiaSat 3S, was 71% (2000. 60%). The decline in utilisation on AsiaSat 2 was due either to customers not renewing their transponder contracts, or their migration from analogue to digital

#### Market review

Overall demand in the Asian transponder market declined in the first half of the year. We believe this was, to a large extent, the result of the global economic downturn. With the prevailing uncertainty continuing, existing broadcast and telecommunications operators are either contracting, or are reluctant to expand, their businesses until they see clear signs of recovery. In addition, new entrants are hesitant to invest as they await a turnaround.

The overall supply of transponder capacity in the region continues to outpace demand, particularly in Ku-band. The result has been keener competition and increasing downward pressure on prices.

Viewing this situation as temporary, AsiaSat has resisted following competitors' pricing down to current levels and has worked to maintain a premium rate. Although not immune from this pressure, AsiaSat has adopted a strategy of offering only short-term price reductions for selected contracts that are viewed as strategic in nature.

In the year 2001, approximately 20% of the revenue recorded in 2000 will be due for renewal. Not all contracts due so far in 2001 have been renewed, nor is it anticipated that all remaining contracts will be renewed or signed at the same rates. The contracts that were not renewed contributed to the drop in utilisation, mainly the C-band payload on AsiaSat 2, experienced in the first half of the year.

Although not renewing with AsiaSat, there was no evidence that customers who did not renew moved to our competitors. Rather, it appears most elected to reduce the amount of capacity leased in response to the general market conditions. Nevertheless, in the first half of 2001 the marketing of Ku-band transponders on AsiaSat 3S experienced some progress. At the end of June, a total of five Ku-band transponders had been leased on AsiaSat 3S.

As at 30th June, 2001, the Group had contracts on hand worth at HK\$4 8 billion, a major portion of which will be recognised over the next few years

#### **BUSINESS DEVELOPMENT**

#### Associate company

The business venture, SpeedCast (formerly known as PhoenixNet), in which the Group has a 36 5% interest, is developing as planned and has achieved some important milestones.

SpeedCast provides three major services: high-speed Internet, multimedia content delivery and corporate broadcast services such as data package delivery and Internet streaming.

As of 30th June, 2001, SpeedCast had signed up 36 leading ISPs (Internet Services Providers) in 14 countries with each ISP joining with advanced commitments. Currently there are approximately 500 high speed Internet subscribers.

SpeedCast unveiled its "News Channels over the Internet" service, BizTV, in June of this year, and the initial response from the market has been positive. SpeedCast has entered, or anticipates entering, into service contracts with a number of international broadcasting and financial entities in the near future.

For the first six months of 2001, SpeedCast incurred a loss of HK\$62 million (2000. HK\$57 million). Approximately two-thirds of the loss was due to the amortisation of the transponder capacity, platform software and subscriber management/billing systems. The Group's share of the loss amounted to HK\$23 million (2000: HK\$21 million). However, after accounting for the rental on the transponder capacity and the multimedia platform leased to SpeedCast as the Group's contribution for share capital, the net effect to the Group was a loss of HK\$8 million (2000 HK\$4 million).

In the near term, the Group does not anticipate any return from its participation in this joint venture. However, longer term, the prospects for SpeedCast are promising.

# AsiaSat 4

Since the award of the satellite manufacturing contract to Boeing Satellite Systems International, Inc. (formerly Hughes Space and Communications International, Inc.) in September 2000, the construction has progressed according to schedule.

The launch vehicle, Atlas IIIB has also been progressing in accordance with schedule and there are no known issues affecting the progress of this rocket

AsiaSat 4 will have 28 C-band and 16 Ku-band transponders with regional coverage in addition to 4 BSS Hong Kong transponders. The satellite is planned to be launched in the first half of 2002 to the orbital slot of 122 degrees East.

OUTLOOK

There have been no clear signs of economic recovery in the United States this year, despite a series of interest rate cuts. Furthermore, none of the major economic indicators show signs of recovery in the immediate future, and these factors have been reflected in the economies of most countries in the Asia-Pacific region. As a result, the year 2001 will be one of consolidation for

AsiaSat after a year of rapid growth in 2000. The Group anticipates that in 2001 it will be very

difficult to achieve growth, or even maintain the same levels achieved in 2000. However, the

Board is confident in the future, and believes that the Group is well placed to take advantage of

the recovery when it occurs.

**DIRECTORS AND STAFF** 

I wish to thank the Board of Directors and all the employees of the Group for their support,

' dedication and hard work during this period of economic uncertainty.

**Romain Bausch** 

Chairman

Hong Kong, 24th August, 2001

## PURCHASE, SALE OR REDEMPTION OF SHARES

During the six months ended 30th June, 2001, neither the Company nor any of its subsidiaries purchased, sold or redeemed any of the Company's shares

Control of the Contro

## **DIRECTORS' INTERESTS**

As at 30th June, 2001, as recorded in the register required to be maintained under Section 29 of the Securities (Disclosure of Interests) Ordinance ("SDI Ordinance"), the following Directors have the following interests in the share capital of the Company.

## (i) Shares

Mr Peter Jackson had a personal interest in 123,500 shares in the Company.

# (II) Share options

Mr Peter Jackson had a personal interest in 485,000 options, of which 335,000 are exercisable from 26th November, 1999 to 25th November, 2006 and 150,000 exercisable from 1st October, 2002 to 30th September, 2009, to subscribe for shares in the Company at an exercise price of HK\$17.48 per share.

Mr. William Wade had a personal interest in 430,000 options, of which 316,000 are exercisable from 26th November, 1999 to 25th November, 2006 and 114,000 exercisable from 1st October, 2002 to 30th September, 2009, to subscribe for shares in the Company at an exercise price of HK\$17 48 per share

Other than as disclosed above, and as recorded in the register required to be maintained under Section 29 of the SDI Ordinance, none of the Directors or their associates, had any interests in any shares of the Company or any of its associated corporations as defined in the SDI Ordinance and, save as disclosed above, none of the Directors or their spouses or children under the age of 18, had any right to subscribe for shares of the Company, or had exercised any such right during the period

#### SUBSTANTIAL SHAREHOLDER

As at 30th June, 2001, the register required to be kept under Section 16(1) of the SDI Ordinance shows that the Company had been notified that the following company held an interest of 10% or more in the issued share capital of the Company:

| Name              | No. of shares | %    |  |
|-------------------|---------------|------|--|
| Bowenvale Limited | 268,905,000   | 68 9 |  |

Notes

- (1) The interest of Bowenvale Limited ("Bowenvale") in 268,905,000 shares in the Company is attributed to Able Star Associates Limited ("Able Star") and SES Finance S A ("SES Finance")
- (2) Able Star is a wholly-owned subsidiary of CITIC Asia Limited ("CITIC Asia"), which in turn is a wholly-owned subsidiary of CITIC International Holdings Limited ("CITIC International") which is a wholly-owned subsidiary of China International Trust and Investment Corporation ("CITIC") Able Star, CITIC Asia, CITIC International and CITIC are each taken to be interested in such shares under Sections 8(2) and (3) of the SDI Ordinance
- (3) SES Finance is a wholly-owned subsidiary of Société Européenne des Satellites S A ("SES") SES Finance and SES are each taken to be interested in such shares under Sections 8(2) and (3) of the SDI Ordinance
- (4) CITIC controls 50 5% of the economic interest and 50% of voting rights of Bowenvale whilst SES controls 49 5% and 50%, respectively

# ARRANGEMENT TO PURCHASE SHARES OR DEBENTURES

Save as disclosed above, at no time during the period was the Company, or any of its subsidiaries, a party to any arrangements to enable the Directors of the Company to acquire benefits by means of the acquisition of shares in, or debentures of, the Company or any other body corporate.

# PRACTICE NOTE 19 OF THE LISTING RULES

Pursuant to paragraph 3 7.1 of the Practice Note 19 of the Rules Governing the Listing of Securities on The Stock Exchange of Hong Kong Limited, the Company discloses that the covenants relating to the loan facility of HK\$1,950 million (US\$250 million) for a term of five years require (a) CITIC and SES between them to maintain beneficial ownership of more than 75% of the ordinary issued share capital of Bowenvale Limited, which is a substantial shareholder of the Company; and (b) Bowenvale Limited to maintain beneficial ownership of at least 51% of the issued share capital of the Company.

# CODE OF BEST PRACTICE

None of the Directors of the Company is aware of any information that would reasonably indicate that the Company is not, or was not for any part of the six months ended 30th June, 2001, in compliance with the Code of Best Practice as set out in Appendix 14 of the Rules Governing the Listing of Securities on The Stock Exchange of Hong Kong Limited.

## FINANCIAL REVIEW

## Financial results analysis

During the period under review, the Group had a slight decline both in terms of turnover and profit attributable to shareholders. The decline in turnover was mainly due to the proceeds for 1996 sale of Ku-band transponders on AsiaSat 2 that were fully recognised at the end of May 2000, amounting to HK\$41 million. The financial results are highlighted below

|                                     |          |      | · · · · · · · · · · · · · · · · · · · | %      |
|-------------------------------------|----------|------|---------------------------------------|--------|
|                                     |          | 2001 | 2000                                  | Change |
| Turnover                            | нк\$м    | 477  | 513                                   | -7     |
| Profit attributable to shareholders | нк\$м    | 274  | 286                                   | -4     |
| Dividend                            | нк\$м    | 23   | 23                                    | -      |
| Earnings per share                  | HK cents | 70   | 73                                    | -4     |
| Dividend per share                  | HK cents | 6    | 6                                     | _      |
| Dividend cover                      | Times    | 12   | 12                                    | _      |

With slow down in the global economies coupled with oversupply of transponder capacity particularly in Ku-band, the Group does not anticipate any significant improvement in the second half.

# LIQUIDITY AND FINANCIAL RESOURCES

# Sources of financing

The Group's principal use of capital during the period under review was the capital expenditure related to the construction of AsiaSat 4. In addition, the Group also paid HK\$26 million for acquisition of leasehold land at Tai Po for the construction of telemetry, tracking and control ("TT&C") facilities. These payments were financed through cash flow from operations.

On 24th November, 2000, the Company and its subsidiary, Asia Satellite Telecommunications Company Limited entered into an agreement with a consortium of banks to provide a secured term loan credit facility of US\$250 million (the "Loan Facility") with Asia Satellite Telecommunications Company Limited as borrower and the Company as guarantor. The loan is divided into two tranches, Tranche A for US\$100 million and Tranche B for US\$150 million. The loan together with cash flow from operations is required to meet the capital expenditure of AsiaSat 4 and other projects. As at 30th June, 2001, there was no outstanding bank loan.

## Interest and repayment

The Loan Facility provides that (i) borrowings will bear interest at a rate based on the London Interbank Offered Rate ("LIBOR") plus a margin determined with reference to certain financial ratios achieved, (ii) the Loan Facility will have a term of five years and be repaid in five equal semi-annual instalments, commencing on 24th November, 2003, and (iii) subject to certain conditions, the Group may, without premium or penalty, prepay all or part of its borrowings under the Loan Facility. The Loan Facility provides that the Group must use certain percentage of any Excess Cash Flow (as defined in the Loan Facility) for the purpose of debt servicing under the Loan Facility, paying costs in connection with the construction, launch and insurance of AsiaSat 4 or any replacement satellite, if any, and fulfilling certain capital requirements.

# Security

The Loan Facility is secured by the Group's assets, including its existing and future satellites, payments received in respect of transponder utilisation agreements on these satellites and assignments of construction and TT&C contracts relating to the Group's satellites. The Loan Facility is also guaranteed by the Company.

## Covenants

The Loan Facility includes covenants customary for agreements of this type, including restrictions on the Group's ability to incur indebtedness, certain restrictions on the Company's ability to pay dividends, restrictions on affiliated transactions, certain financial covenants, covenants with respect to compliance with laws, maintenance of licences and permits required for the Group's business and a requirement that all future transponder utilisation agreements be entered into on an armslength basis.

## **Restricted distributions**

The Loan Facility provides that the Company may make aggregate annual dividend payments in an amount not exceeding 20% of EBITDA (earnings before interest, tax, depreciation and amortisation) for the relevant financial period or, if lower, 25% of the net profit for the relevant financial period.

# **CAPITAL STRUCTURE**

# **Funding and treasury policy**

The Group adopts conservative treasury policies and exercises tight control over its cash and risk management. Cash is generally placed in short term deposits denominated in U.S. Dollars to meet its capital expenditure. The banking facilities of the Group are largely denominated in U.S. Dollars that can be met by its U.S. Dollar revenue. Thus, the Group does not have any significant currency exposure.

# **Currencies in borrowings**

Currently all the borrowings are denominated in U.S. Dollars.

#### interest rates

The interest rate on the Loan Facility is floating and based on LIBOR plus a margin determined with reference to certain financial ratios.

## Financial instruments for hedging

Since almost all the revenue of the Group is in U.S. Dollars there is no need to hedge its liabilities, which are also substantially denominated in U.S. Dollars.

# Foreign currency investment

The Group does not have any material investment in foreign currencies other than in Hong Kong Dollars

# ORDER BOOK

As at 30th June, 2001, the value of contracts on hand amounted to HK\$4,871 million (31st December, 2000. HK\$4,672 million), the majority of which will be realised over the next few years. All the contracts are denominated in U S. Dollars.

# SEGMENT INFORMATION

The turnover of the Group, analysed by geographical location of customers, is disclosed in note 4 to the condensed financial statements

#### **EMPLOYEES AND REMUNERATION POLICIES**

As at 30th June, 2001, the Group had 78 permanent staff (31st December, 2000 75)

The Group considers its human resources as one of its most valuable assets. The talent pool that the Group draws from overlaps with the telecommunications, information technology and some high-tech equipment vendor industries.

The Group has established a performance based appraisal system. The present remuneration package consists of salaries, housing benefits (applicable to certain grades of employees), discretionary bonuses, share options (again applicable to certain grades of employees) and fringe benefits that are compatible with the market.

Pursuant to the share option scheme of the Company adopted on 3rd June, 1996 (the "Scheme"), the Board of Directors of the Company may grant options to any full time employees of the Company or any of its subsidiaries to subscribe for shares in the Company at the average of the closing prices of the Company's shares on the Stock Exchange for the five trading days immediately preceding the date of the grant of the options, subject to a maximum of 10% of the issued share capital of the Company from time to time.

The Group does not operate an in-house regular training programme. However, the Group does provide ad hoc training on new developments/facilities and sponsor employees to attend external vocational training that is relevant to their jobs and their career progression.

# **CHARGES ON GROUP ASSETS**

The Group entered into the Loan Facility to finance the construction of AsiaSat 4. The Loan Facility is secured by an assignment of all rights, title, benefits and interest in the insurance and transponder receipts of the satellites and a fixed and floating charge over the assets of the Group, including its existing and future satellites. In addition, the loan agreement contains certain financial covenants that, among other things, require the Group to maintain a certain level of net assets, and restrict the Group's amount of borrowings and liabilities.

#### **CAPITAL COMMITMENTS**

Details of the capital commitments of the Group are set out in note 13 to the condensed financial statements.

As at 30th June, 2001, the Group had total capital commitments of HK\$778 million (31st December, 2000. HK\$1,059 million), payable in one to two years, of which HK\$469 million (31st December, 2000. HK\$745 million) was contracted for but not provided in the financial statements and the remaining HK\$309 million (31st December, 2000: HK\$314 million) was authorised by the Board but not contracted for.

#### **GEARING RATIO**

As at 30th June, 2001, the debt-to-equity gearing ratio (i.e. total bank loans at period-end over shareholders' funds at period-end) was 0 100 (31st December, 2000: 0:100). Had the Loan Facility been fully drawn as at the balance sheet date the ratio would be 42.58.

# **EXCHANGE RATES AND ANY RELATED HEDGES**

During the period, almost all of the Group's revenues, premiums for satellite insurance coverage and debt service and substantially all capital expenditure were denominated in U.S. Dollars. The Group's remaining expenses were primarily denominated in Hong Kong Dollars. As at 30th June, 2001, almost all the Group's transponder utilisation agreements, transponder purchase agreements, borrowings, obligations to construct and launch satellites and to purchase telemetry, tracking and control equipment were denominated in U.S. Dollars. Hence, the Group does not have any significant currency exposure and does not need to hedge.

#### **CONTINGENT LIABILITIES**

Pursuant to a change effective from 1st April, 2001 in Indian tax regulations, the Group may be subject to an Indian income tax on revenues received by the Group in respect of lease payments for transponders used by the Group's customers for purposes of earning income from any source in India. The methodology for calculation of the income taxable in India and the additional tax expense that may be incurred by the Group is not yet clear. Since it is not possible to estimate the amount payable by the Group, no provision has been recognised in these condensed financial statements.

In addition, the Indian tax authorities have taken the position that the Group is liable for income tax under the same regulations as in force prior to 1st April, 2001. In accordance with this position, the Indian tax authorities have made assessments against the Group (including interest as of 21st March, 2001) totalling approximately HK\$23.4 million (INR131 million) for the assessment year 1997-1998 and approximately HK\$25.2 million (INR141 million) for the assessment year 1998-1999. No assessment has yet been made for the 1999-2000 or 2000-2001 assessment years. Based upon advice from its professional advisors, the Group does not believe that it is liable for the taxes assessed by the Indian tax authorities for the pre-1st April, 2001 period and has filed appeals for each of the assessment years 1997-1998 and 1998-1999. Since it is not considered probable that the Group will be required to make any settlement in respect of these assessments, no provision has been recognised in these condensed financial statements.

Pursuant to the telemetry, tracking, control and monitoring licence granted by the Chief Executive in Council under the Telecommunications Ordinance (Laws of Hong Kong, Cap 106) the Group was granted a broadcasting satellite service ("BSS") licence (the "Licence") on 27th June, 2000 to maintain and operate a payload of four channels onboard AsiaSat 4. Asia Satellite Telecommunications Company Limited, as the Licensee, has provided a performance bond of HK\$5 million in favour of The Government of The Hong Kong Special Administrative Region as a condition of the grant of the Licence.

INDEPENDENT REVIEW REPORT

TO THE BOARD OF DIRECTORS OF

ASIA SATELLITE TELECOMMUNICATIONS HOLDINGS LIMITED

(Incorporated in Bermuda with limited liability)

INTRODUCTION

We have been instructed by the Company to review the interim financial report set out on pages

15 to 26.

**DIRECTORS' RESPONSIBILITIES** 

The Rules Governing the Listing of Securities on The Stock Exchange of Hong Kong Limited require

the preparation of an interim financial report to be in compliance with Statement of Standard

Accounting Practice 25 "Interim Financial Reporting" issued by the Hong Kong Society of Accountants

and the relevant provisions thereof. The interim financial report is the responsibility of, and has

been approved by, the Directors.

REVIEW WORK PERFORMED

We conducted our review in accordance with Statement of Auditing Standards ("SAS") 700

"Engagements to Review Interim Financial Reports" issued by the Hong Kong Society of Accountants.

A review consists principally of making enquiries of group management and applying analytical

procedures to the interim financial report and based thereon, assessing whether the accounting

policies and presentation have been consistently applied unless otherwise disclosed. A review

excludes audit procedures such as tests of controls and verification of assets, liabilities and

transactions. It is substantially less in scope than an audit and therefore provides a lower level of

assurance than an audit. Accordingly we do not express an audit opinion on the interim financial

report.

REVIEW CONCLUSION

On the basis of our review which does not constitute an audit, we are not aware of any material

modifications that should be made to the interim financial report for the six months ended 30th

June, 2001.

Without modifying our review conclusion, we draw to your attention that the comparative condensed

consolidated income statement, consolidated cash flow statement and consolidated statement of

recognised gains and losses for the six months ended 30th June, 2000 disclosed in the interim

financial report have not been reviewed in accordance with SAS 700.

Deloitte Touche Tohmatsu

Certified Public Accountants

Hong Kong, 24th August, 2001

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# CONDENSED CONSOLIDATED INCOME STATEMENT

For the six months ended 30th June, 2001

|                                       |       | Six months ended 30th June |             |
|---------------------------------------|-------|----------------------------|-------------|
|                                       | Notes | 2001                       | 2000        |
|                                       |       | HK\$'000                   | HK\$'000    |
|                                       |       | (unaudited)                | (unaudited) |
| Turnover                              | 4     | 476,880                    | 513,080     |
| Cost of services                      |       | (119,473)                  | (126,080)   |
|                                       |       | 357,407                    | 387,000     |
| Other revenue                         |       | 2,395                      | 5,687       |
| Administrative expenses               |       | (30,588)                   | (33,495)    |
| Profit from operations                | 5     | 329,214                    | 359,192     |
| Finance costs                         |       | _                          | (37,157)    |
| Bank interest income                  |       | 3,773                      | 25,500      |
| Share of results of associates        |       | (22,670)                   | (21,107)    |
| Profit before taxation                |       | 310,317                    | 326,428     |
| Taxation                              | 6     | 36,299                     | 40,419      |
| Profit after taxation                 |       | 274,018                    | 286,009     |
| Minority interest                     |       | 11                         | 13          |
| Profit attributable to shareholders   |       | 274,007                    | 285,996     |
| Dividend                              |       |                            |             |
| Proposed interim dividend of HK\$0.06 |       |                            |             |
| per share (2000: HK\$0.06)            | 7     | 23,416                     | 23,415      |
| Earnings per share                    | 8     |                            |             |
| Basic                                 |       | HK\$0.70                   | HK\$0 73    |
| Diluted                               |       | N/A                        | HK\$0 73    |

# CONDENSED CONSOLIDATED BALANCE SHEET

At 30th June, 2001

|   | Notes | 30.6.2001<br>HK\$'000<br>(unaudited) | 31 12.2000<br>HK\$'000<br>(audited and<br>restated) |
|---|-------|--------------------------------------|---|
| Non-current assets                                  |       |                                      |   |
| Property, plant and equipment                       | 9     | 2,747,541                            | 2,521,193   |
| Unbilled lease rental receivable                    |       | 122,352                              | 99,037  |
| Investments in associates                           |       | 27,877                               | 53,613  |
|   |       | 2,897,770                            | 2,673,843   |
| Current assets                                      |       |                                      |   |
| Trade and other receivables                         | 10    | 105,601                              | 119,693   |
| Bank balances and cash                              |       | 169,811                              | 108,977   |
|   |       | 275,412                              | 228,670   |
| Current liabilities                                 |       |                                      |   |
| Other payables                                      |       | 44,322                               | 75,957  |
| Deferred revenue                                    |       | 171,442                              | 159,618   |
| Taxation payable                                    |       | 96,849                               | 53,751  |
| Dividend payable                                    |       | 121                                  | 121   |
|   |       | 312,734                              | 289,447   |
| Net current liabilities                             |       | (37,322)                             | (60,777)  |
| Total assets less current liabilities               |       | 2,860,448                            | 2,613,066   |
| Non-current liabilities                             |       |                                      |   |
| Deferred taxation                                   |       | 122,798                              | 128,990   |
| Deferred revenue                                    |       | 62,060                               | 21,728  |
| Provision for maintenance cost of transponders sold |       | _                                    | 76,722  |
|   |       | 184,858                              | 227,440   |
| Minority interest                                   |       | 486                                  | 476   |
| Net assets  |       | 2,675,104                            | 2,385,150   |
| Capital and reserves                                |       |                                      |   |
| Share capital                                       | 11    | 39,027                               | 39,027  |
| Reserves  | 12    | 2,636,077                            | 2,346,123   |
|   |       | 2,675,104                            | 2,385,150   |

# CONDENSED CONSOLIDATED STATEMENT OF RECOGNISED GAINS AND LOSSES

For the six months ended 30th June, 2001

|   | Six months ended 30th June |             |
|---|----------------------------|-------------|
|   | 2001                       | 2000        |
|   | HK\$'000                   | HK\$'000    |
|   | (unaudited)                | (unaudited) |
| Profit attributable to shareholders and total recognised gains    |                            |             |
| for the period  | 274,007                    | 285,996     |
|   |                            |             |
| Prior period adjustments arising from the effects of changes      |                            |             |
| in accounting policies (see note 3)                               | 70,584                     | 54,611      |
| <ul> <li>adjustment to retained profits at 1st January</li> </ul> | , 0,304                    | 54,011      |

# CONDENSED CONSOLIDATED CASH FLOW STATEMENT

For the six months ended 30th June, 2001

|  | Six months ended 30th June |  |
|--|----------------------------|--|
|  | 2001                       | 2000   |
|  | HK\$'000                   | HK\$'000   |
|  | (unaudited)                | (unaudited)  |
| Net cash inflow from operating activities                | 449,719                    | 355,120  |
| Net cash outflow from returns on investments and         |                            |  |
| servicing of finance                                     | (50,811)                   | (54,996)   |
| Overseas tax paid  | (5,532)                    | (4,183)  |
| Net cash outflow from investing activities               | (320,784)                  | (1,540)  |
| Net cash inflow before financing                         | 72,592                     | 294,401  |
| Net cash outflow from financing                          | (11,758)                   | (226,178)  |
| Increase in cash and cash equivalents                    | 60,834                     | 68,223   |
| Cash and cash equivalents at the beginning of the period | 108,977                    | 789,363  |
| Cash and cash equivalents at the end of the period,      |                            |  |
| representing bank balances and cash                      | 169,811                    | 857,586  |
|  |                            | State and state of the state of |

Additional information and specific enquiries concerning the Company's ADRs should be addressed to:

Investor Relations

The Bank of New York

P O Box 11258

**Church Street Station** 

New York, NY 10286-1258

U.S.A.

Tel. (1)-888-BNY-ADRs (Toll free for domestic callers)

(1) 908 769 9835 / (1) 908 769 9711 (for international callers)

Email: shareowner-svcs@bankofny.com

Website. http://www.adrbny.com or http://www.stock.bankofny.com

Other enquiries regarding the Company should be addressed to:

Corporate Affairs Manager

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