

ウガンダ国
ナカワ職業訓練校プロジェクト
終了時評価報告書

平成13年12月
(2001年)

国際協力事業団
社会開発協力部

社協二
JR
01-024

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序 文

国際協力事業団はウガンダ共和国に対して、昭和43年から6年間「ウガンダ職業訓練センター」プロジェクトを実施し、ナカワ職業訓練校の設立と技能者育成に協力した。その後、アミン政権以降の政治的・社会的混乱期を経てウガンダ共和国は復興開発に向かい、昭和61年の現ムセベニ政権樹立以来産業の育成に努めてきたが、内戦のもたらした技能労働者不足は深刻で、人的資源開発が国の最重点課題になっていた。

こうした状況を踏まえてウガンダ共和国政府は、改めて、ナカワ職業訓練校に係るプロジェクト方式技術協力を要請してきた。これを受けて我が国は、無償資金協力で施設建設を支援する一方、当事業団はプロジェクト方式技術協力の準備を進め、平成9年3月に実施協議調査団が討議議事録（R/D）の署名を取り交わして、同年5月20日から5年間の計画で「ウガンダ国ナカワ職業訓練校プロジェクト」を開始した。

今般は、協力期間の終了を約半年後に控え、プロジェクトの成果を把握するとともにプロジェクトの最終評価を行うため、平成13年10月28日から11月11日まで、厚生労働省職業能力開発局海外協力課課長補佐 海前 嘉明氏を団長とする終了時評価調査団を現地に派遣した。同調査団はウガンダ共和国側関係者と合同で終了時評価にあたった結果、プロジェクトは効率的、かつ効果的にウガンダ共和国政府と産業界のニーズに貢献し、プロジェクト目標をおおむね達成できることが明らかになった。しかしながら、ナカワ職業訓練校が同国の公共職業訓練ニーズに果たすべき役割がまだ大きいこと、技術移転が遅れた木工科や、新しいニーズに対応する必要のある電子科、自動車科の3科を中心に、引き続き協力することが望ましいと判断された。

本報告書は同調査団の調査・評価結果を取りまとめたもので、今後の国際協力活動に、広く活用されることを願うものである。

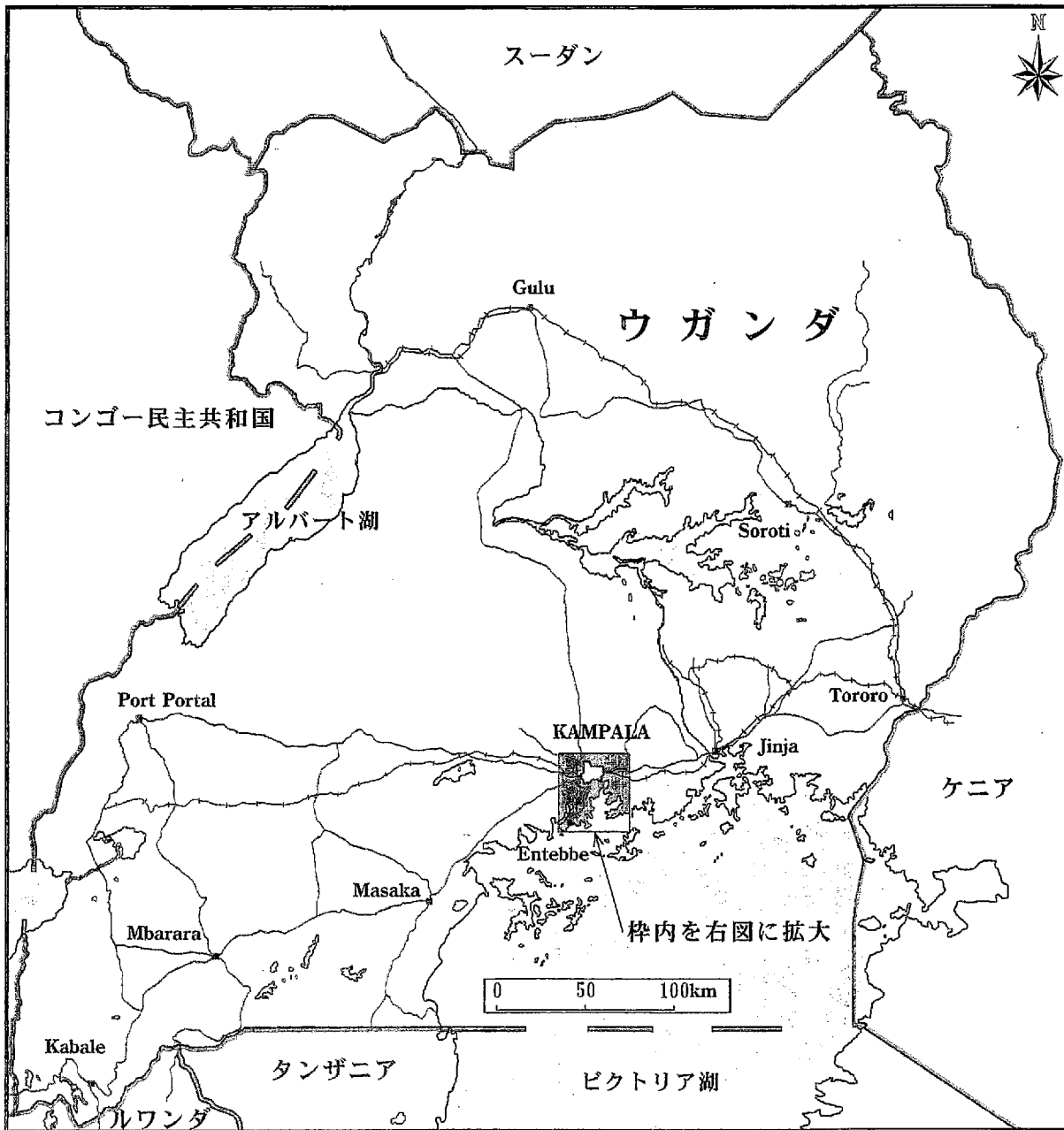
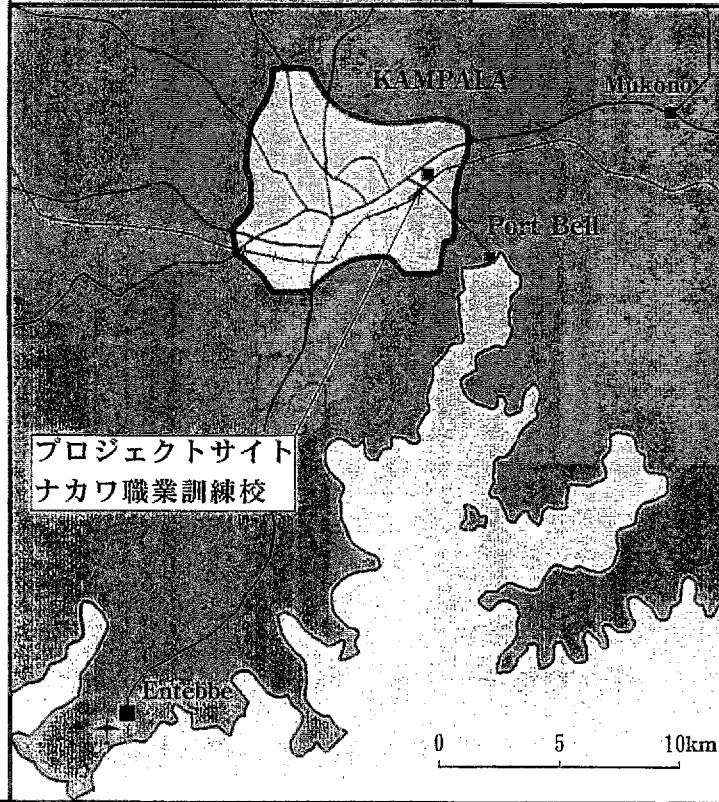
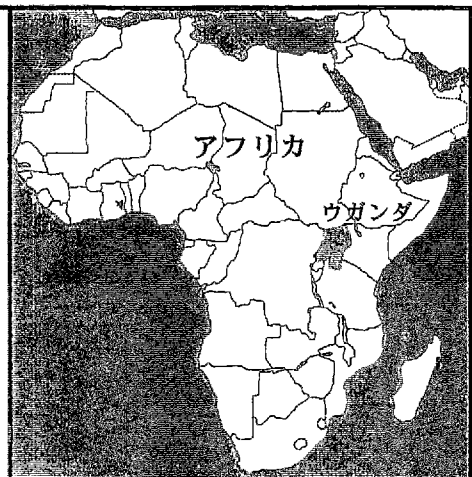
ここに、本調査にご協力頂いた外務省、厚生労働省、雇用・能力開発機構、在ウガンダ共和国及びケニア共和国日本大使館など、内外関係各機関の方々に心から謝意を表するとともに、引き続き一層のご支援をお願いする次第である。

平成13年12月

国際協力事業団

理事 泉 堅二郎

プロジェクトサイトの
位置図

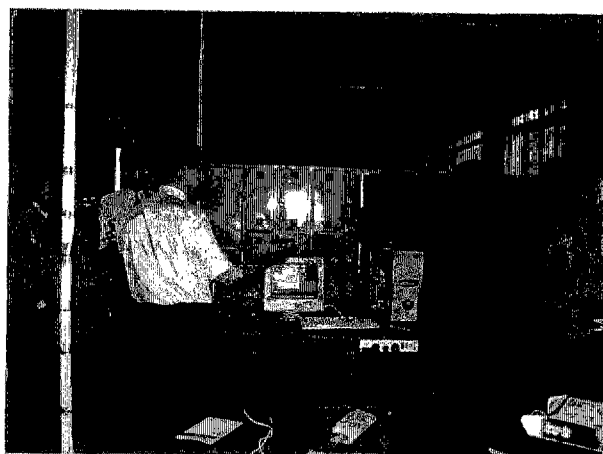




◀ 給水塔を活用した
ナカワ職業訓練校看板



◀ 教育・スポーツ省次官への
表敬訪問



◀ 電子科向上訓練受講生
へのインタビュー



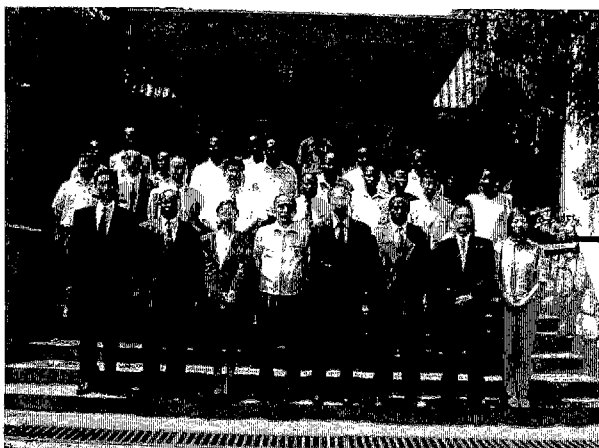
◀ 自動車科カウンターパート
への指導風景



◀ ミニッツ協議



◀ ミニッツ署名・交換



◀ プロジェクト関係者集合写真

略 語 表

BTVET : Department of Business, Technical and Vocational Education & Training	商業・技術・職業・ 教育訓練局
DAC : Development Assistance Committee	開発援助委員会
DIT : Directorate of Industrial Training	職業訓練局
ESIP : Educational Strategic Investment Plan	
GTZ : Deutsche Gesellschaft für Technische Zusammenarbeit(独)	ドイツ技術協力公社
LLDC : Least among Less Developed Countries	後発開発途上国
PDM : Project Design Matrix	プロジェクト・デザイン・ マトリックス
R/D : Record of Discussions	討議議事録
UNIDO : United Nations Industrial Development Organization	国連工業開発機関
USAID : United States Agency for International Development	米国国際開発庁
PROTS : PROgressive Training System for Instructor	指導技術法の1つ

評価調査結果要約表

. 案件の概要																													
国名：ウガンダ共和国	案件名：ナカワ職業訓練校プロジェクト 終了時評価調査																												
分野：職業訓練	援助形態：プロジェクト方式技術協力																												
所轄部署：社会開発協力部 社会開発協力第二課	協力金額（評価時点）：1,137百万円																												
協力期間	(R/D): 1997年5月20日～2002年5月19日 (5年間)																												
	先方関係機関：教育・スポーツ省、 ナカワ職業訓練校																												
	日本側協力機関：厚生労働省、 雇用・能力開発機構																												
	他の関連協力：無償資金協力																												
<p>1. 協力の背景と概要</p> <p>ウガンダ共和国（以下、「ウガンダ国」と記す）は、1986年の現ムセベニ政権樹立以来、復興開発計画（1993/1994～1995/1996）に基づき国家の再建を進めてきた。しかしながら、長期にわたる内戦による技能労働者の不足は、同国の産業振興、経済発展にとって大きな阻害要因となっており、同国政府は同計画において人的資源開発を最重点課題とし、教育の再建、職業訓練及び雇用の問題に優先的に取り組んでいる。</p> <p>本プロジェクトは、ナカワ職業訓練校において従来から実施されてきた在職労働者に対する徒弟訓練、向上訓練に加え、産業界から特にニーズの高い若年無技能者に対する養成訓練を実施すべく、優先度が高い電子、電気、機械、自動車、木工、板金、溶接の7分野について我が国への協力要請を行ったものである。</p> <p>2. 協力内容</p> <p>(1) 上位目標 ウガンダ国の産業、工業界の求める技能労働者の需要を満たす。</p> <p>(2) プロジェクト目標 ナカワ職業訓練校において、各分野（機械、電気、溶接、板金、自動車、電子、木工）での産業、工業界の求める技術者が養成される。</p> <p>(3) 成果 各分野の職業訓練に必要な体制が整備される。 各分野の職業訓練指導員の能力が向上する。 各分野の養成訓練（昼間、夜間）、向上訓練の訓練コース内容が設定され、適切に実施される。徒弟訓練が職業訓練局（DIT）の要請に基づき適切に実施される。</p> <p>(4) 投入（評価時点）</p> <p>日本側：</p> <table style="width: 100%; border: none;"> <tr> <td style="width: 30%;">長期専門家派遣</td> <td style="width: 10%;">17名</td> <td style="width: 30%;">機材供与</td> <td style="width: 30%;">424百万円</td> </tr> <tr> <td>短期専門家派遣</td> <td>10名</td> <td>ローカルコスト負担</td> <td>37百万円</td> </tr> <tr> <td>研修員受入れ</td> <td>18名</td> <td>その他</td> <td></td> </tr> </table> <p>ウガンダ国側：</p> <table style="width: 100%; border: none;"> <tr> <td style="width: 30%;">カウンターパート配置</td> <td style="width: 10%;">50名</td> <td style="width: 30%;"></td> <td style="width: 30%;"></td> </tr> <tr> <td>土地・施設提供</td> <td>356百万U. Shs. (約2,492万円)</td> <td></td> <td></td> </tr> <tr> <td>ローカルコスト負担</td> <td>1,184百万U. Shs. (約8,288万円)</td> <td></td> <td></td> </tr> <tr> <td>その他</td> <td></td> <td></td> <td></td> </tr> </table>		長期専門家派遣	17名	機材供与	424百万円	短期専門家派遣	10名	ローカルコスト負担	37百万円	研修員受入れ	18名	その他		カウンターパート配置	50名			土地・施設提供	356百万U. Shs. (約2,492万円)			ローカルコスト負担	1,184百万U. Shs. (約8,288万円)			その他			
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その他																													

. 評価調査団の概要		
調査者	総括 海前 嘉明 厚生労働省職業能力開発局海外協力課課長補佐 技術訓練 若松 道博 雇用・能力開発機構総務部産業情報ネットワーク 企画室専門役 丸山 雅滋 雇用・能力開発機構職業能力開発企画部国際室 国際協力課専門役 プロジェクト運営管理 熊谷 晃子 国際協力事業団社会開発協力部 社会開発協力第二課課長代理 協力企画 大村 文 国際協力事業団社会開発協力部 社会開発協力第二課職員 評価分析 渡辺 博 東洋エンジニアリング株式会社コンサルタント部	
調査期間	2001年10月28日～11月11日	評価種類：終了時評価
. 評価結果の概要		
<p>1. 評価結果の要約</p> <p>(1) 妥当性 現行のウガンダ国の教育訓練政策は、初等教育により重点が置かれているが、ウガンダ産業界のニーズ、日本の協力重点分野の観点からすれば妥当性は高いといえる。</p> <p>(2) 有効性 養成訓練に対する高い応募率、卒業生のTrade Test合格率の高さ、就職率の高さ、向上訓練に対する企業の評価の高さ等から、有効性は高いものと判断される。</p> <p>(3) 効率性 電子、木工、板金の3科用機材の供与遅れがあったため、その3科の養成訓練がそれに伴い1年遅れて開始となった。また、電子、自動車科では急速な市場のニーズ変化に対応するためのコース改編に必要な技術移転が残されているが、当初計画と投入実績及び活動実績に関していえば、効率性はおおむね良好と判断される。</p> <p>(4) インパクト 国連工業開発機関（UNIDO）、NGOとの連携による訓練の実施、他の職業訓練機関指導員への指導技法訓練の実施、各科定員に女性枠があること、寮があることにより、地元だけでなく全国から訓練生が入校していることなど、正のインパクトのみ観察された。</p> <p>(5) 自立発展性 財政面では、国家予算が厳しい状況にあり動向を注視する必要があること、人的な面ではウガンダ国側の努力が行われていること、技術面では一部日本からの今後の援助が望まれていることから、現時点では完全な自立発展性があるとはいえないものの、ウガンダ国側の自立発展に向けた動きは見受けられるといえる。</p> <p>2. 効果発現に貢献した要因</p> <p>(1) 計画内容に関すること 各科の訓練内容は産業界の即戦力を望むニーズに合致していた。</p> <p>(2) 実施プロセスに関すること</p> <ul style="list-style-type: none"> ・政府予算の不足に対応するため、インカムジェネレーション活動を実施し、校運営費を補填した。 ・委員会による校運営により、運営の円滑化を図った。 ・イントラネットの構築により、情報の共有化と透明性の確保を実現した。 		

3．問題点及び問題を惹起した要因

(1) 計画内容に関すること

徒弟訓練については、ウガンダ国側DITの要請に基づいて行うことに中間評価段階で変更されたが、要請がなかったため、実施されず、達成率を引き下げる結果となった。

(2) 実施プロセスに関すること

電子、板金、木工の3科の機材供与が遅れたため、3科の養成訓練は他の4科に比して1年遅れて開始された。

4．結論

プロジェクトは効率的かつ効果的にウガンダ国政府と産業界のニーズに貢献した。

教育・スポーツ省の職業教育訓練に関する政策はまだ草案の段階であるが、ナカワ職業訓練校としては政策に沿った活動を今後より一層考慮すべきである。

プロジェクトの準備段階で調査されたOレベルホルダーに対する多大な職業訓練の必要性は、公立職業訓練校が3校しかない現状では、まだ十分に満たされているとはいえず、ナカワ職業訓練校の役割は大きいといえる。

また、技術的観点からみると技術移転が遅れている木工科、ウガンダ国内における新しいニーズに対応するための改編を引き続き進めていくことが望ましい電子科、及び自動車科へのフォローアップとともに、多様なニーズにきめ細かく対応する必要のある各科の向上訓練、その他専門的ないくつかの項目について、引き続き効率を勘案しつつ協力を行うことが望ましい。

5．提言

(1) ウガンダ国側のナカワ職業訓練校への適切な予算配分と人員配置の継続。

(2) 機材の適正な保守管理の継続、保守運営費の確保、予備品調達先一覧表の作成。

(3) 政策研究、ニーズ調査、卒業生調査等による社会、産業界のニーズ調査の継続。

(4) 電子、自動車、木工、向上訓練、その他専門分野における我が国の技術協力の実施。

6．教訓

(1) 共通科目については、事前に各科の意見交換を実施することが訓練の管理、運営上効果的・効率的である。

(2) 予算配分が不足する場合には、訓練の妨げにならない限度で技能向上に資する範囲にてインカムジェネレーション活動を行うことが有効である。

(3) 機材供与の遅れなど、投入の遅れが予想される場合には、個々の活動の時期を見直すことが効率の面から重要である。

(4) 委員会方式による校運営は各科の意見を反映するのに有効な手段である。

(5) イン트라ネットによる情報共有化は、関係者の円滑なコミュニケーションとインカムジェネレーション活動の透明性確保に有効である。また、今後のJICA職業訓練プロジェクトの地域間、各国間等における訓練カリキュラム、教材、訓練計画等の情報共有化への進展、訓練全体の運営管理等に有効である。

第1章 終了時評価調査団の派遣

1-1 プロジェクトの概要及び調査団派遣の経緯と目的

ナカワ職業訓練校は、ウガンダ共和国（以下、「ウガンダ国」と記す）の中小企業振興に必要な技能者の向上訓練実施を目的として設立され、1968年6月より1974年6月まで、国際協力事業団（JICA）がプロジェクト方式技術協力「ウガンダ職業訓練センター」プロジェクトを実施した。そのあと、同校はウガンダ国側の手で運営されてきたが、アミン政権以降の政治・社会的混乱期を経て、施設・機材の老朽化、職員の不足、ローカルコスト不足等の問題を抱え、訓練コースの運営が困難な状況となった。他方、1986年からの現ムセベニ政権以降、ウガンダ国は復興開発計画に基づき産業の育成に努めており、工業労働人口需要の増加が予想されるが、内戦による技能労働者の不足が深刻な問題となっている。かかる状況のなか、ナカワ職業訓練校においても従来の在職労働者に対する訓練だけでなく、若年無技能者に対する訓練の実施が急務となった。

こうした状況を踏まえ、ウガンダ国政府は1994年5月、改めて同校に係るプロジェクト方式技術協力「ウガンダ国ナカワ職業訓練校」計画を要請してきた。これを受けてJICAは、事前調査、長期調査を実施したうえで、1997年2月に実施協議調査団を派遣して討議議事録（Record of Discussions：R/D）の署名を取り交わし、同年5月より5年間の協力を開始した。本協力の内容は、7学科（電気、電子、機械、自動車、溶接、板金、木工）における指導員の技術力向上、養成訓練コース及び向上訓練コースの内容確定、並びにその適切な運営について指導・助言を行うものであった。

本調査団は、協力期間終了（2002年5月19日）を約半年後に控え、プロジェクト活動の成果及び実績を評価し、協力期間終了までのプロジェクト活動及びプロジェクト終了後のナカワ職業訓練校のあり方について、ウガンダ国側と協議することを目的に派遣された。

調査の具体的な項目は次のとおりである。

- (1) これまで実施してきたプロジェクトの活動、運営・管理状況、カウンターパートへの技術移転状況について、日本人専門家及びカウンターパートのヒアリング等を通じて情報を収集し、ウガンダ国側関係者との協議を通じて情報の共有・分析を行う。
- (2) プロジェクト・デザイン・マトリックス（Project Design Matrix：PDM）に基づき、評価5項目（妥当性、有効性、効率性、インパクト、自立発展性）の観点からプロジェクトの達成度を判定・評価するとともに、成果及び目標の達成を阻害した要因について分析する。
- (3) 評価結果を日本側・ウガンダ国側双方で確認したうえで、協力期間終了までのプロジェクト活動及びプロジェクト終了後の今後の対応策について検討し、提言を行う。
- (4) 評価結果から他のプロジェクトの形成、運営、評価等の参考となる教訓、及び提言を導き出す。

1 - 2 調査団の構成と調査期間

(1) 調査団の構成

担当分野	氏名	所属
団長・総括	海前 嘉明	厚生労働省職業能力開発局海外協力課課長補佐
技術訓練	若松 道博	雇用・能力開発機構総務部産業情報ネットワーク企画室専門役
技術訓練	丸山 雅滋	雇用・能力開発機構職業能力開発企画部国際室国際協力課専門役
プロジェクト運営管理	熊谷 晃子	国際協力事業団社会開発協力部社会開発協力第二課課長代理
協力企画	大村 文	国際協力事業団社会開発協力部社会開発協力第二課職員
評価分析	渡辺 博	東洋エンジニアリング株式会社コンサルタント部

(2) 調査期間

2001年（平成13年）10月28日～11月11日（15日間）

日順	月日	曜日	時間	行程／活動
1	10月28日	日	12:05 15:50 19:30	成田発（JL411） アムステルダム着 アムステルダム発（KQ117）
2	10月29日	月	6:10 11:00 14:00	ナイロビ着 在ケニア日本大使館表敬訪問 JICAケニア事務所との打合せ
3	10月30日	火	13:10 14:20	ナイロビ発（KQ412） エンテベ着 ウガンダJOCV調整員訪問 在ウガンダ日本大使館表敬訪問 専門家チームとの打合せ
4	10月31日	水		教育・スポーツ省、外務省表敬訪問 商業・技術・職業・教育訓練局（BTVET）ヒアリング ドイツ技術協力公社（GTZ）訪問 職業訓練局（DIT）局長表敬訪問 ルゴゴ職業訓練校視察 ナカワ職業訓練校視察
5	11月1日	木		大蔵省表敬訪問 教育・スポーツ省ヒアリング 評価に関する説明、専門家・カウンターパートのヒアリング
6	11月2日	金		評価に関する説明、専門家・カウンターパートのヒアリング
7	11月3日	土		団内打合せ、ミニッツ準備
8	11月4日	日		団内打合せ、ミニッツ準備
9	11月5日	月		現地有識者との意見交換会〔民間企業、国連工業開発機関（UNIDO）、SASAKAWA GLOBAL 2000等〕 専門家・カウンターパートのヒアリング
10	11月6日	火		ミニッツ協議（合同評価会）
11	11月7日	水		ミニッツ署名・交換 在ウガンダ日本大使館に報告 ウガンダJOCV調整員に報告
12	11月8日	木	9:10 10:20 14:00	エンテベ発（KQ411） ナイロビ着 JICAケニア事務所報告
13	11月9日	金	11:00 14:30 23:05	在ケニア日本大使館報告 ケニア中等理数科教育強化計画プロジェクト視察 ケニア発（KL566）
14	11月10日	土	6:10 20:15	アムステルダム着 アムステルダム発（JL412）
15	11月11日	日	15:30	成田着

注) コンサルタント団員は10月22日成田発（JL411）で先行し、アムステルダム、ナイロビ経由で10月23日エンテベ着（KQ410）、23日以降は本隊と同一行動。

1 - 3 主要面談者

(1) 教育・スポーツ省

Ms. Aketch Betty	Minister of State for Higher Education
Mr. Francis X Lubanga	Permanent Secretary
Mr. Pius Bigirimana	Under Secretary
Ms. Doreen S. Katusiime	Principal Assistant Secretary
Ms. Florence. M. Maringa	Commissioner Education Planning, Education Planning Department
Mr. Okinyal Henry	Acting Commissioner, Department of Business, Technical and Vocational Education & Training
Mr. Kaaya Kizito	Commissioner, Directorate of Industrial Training

(2) 外務省

Mr. Ralph W. Ochan	Permanent Secretary
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(3) 大蔵省

Mr. C. M. Kassami	Permanent Secretary
Mr. E. Katwe	Aid Liaison Department

(4) ナカワ職業訓練校

Mr. Abasi Tuzinde	Principal
Mr. Masolo Sam Jasper	Acting Deputy Principal
Mr. Olowo Silver	H.O.S. (Head of Section) of motor vehicle section (Acting Deputy Principal)

(5) その他

1) ILO (International Labour Organization)

Mr. Osonge Mike	National Project Coordinator
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2) GTZ (Deutsche Gesellschaft für Technische Zusammenarbeit)

Mr. Hannjorg Zitter	Director
Ms. Marianne Reuber	Technical Advisor

3) ルゴゴ職業訓練校

Mr. C. B. Kiwanuka Makumbi	Principal
Mr. Nafutali Onjie	Deputy Principal

4) 向上訓練受注先企業、機関

Mrs. Jane Mambule	UNIDO-UIP Programme
Mr. Albert Semukuutu	UNIDO-UIP Programme
Mr. Kayaayo	Sasakawa Global 2000
Mr. Paul Oloo	Nile Breweries
Mr. Sheikh Arif	Roofing Company
Mr. Charlton	Kinyara Sugar Works
Mr. N. Balyamujura	Kakira Sugar Works
Mr. K. Kunobwa	SCOUL

(6) 在ケニア日本大使館

細谷 龍平	公 使
間島 重道	二等書記官

(7) 在ウガンダ日本大使館

三木 達也	公 使
岩間 創	二等書記官

(8) JICAケニア事務所

大塚 正明	所 長
松浦 信一	次 長
川野邊 浩	所 員

(9) ウガンダJOCV調整員

津川 智明	JOCV調整員
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(10) プロジェクト専門家

坂本 宏	チーフアドバイザー
牧野 丞	業務調整
後藤 哲	溶 接
佐藤 一晃	電気・電子
竹野 俊夫	自動車
野澤 征夫	機 械
山川 敏彦	木 工

第2章 終了時評価の方法

2 - 1 PDMEの作成

JICAでは、1994年よりプロジェクト・サイクル・マネジメント手法（PCM手法）によるプロジェクト運営管理を導入している。PCM手法は、プロジェクトの計画・立案、実施・モニタリング、評価の各段階をPDMと呼ばれるプロジェクト概要表を中心的に用いて管理していく手法である。これにより、一貫したプロジェクト管理と、論理的分析、他のプロジェクトとの情報共有を図ることができる。

本プロジェクトでは、1994年7月の事前調査団によりウガンダ国側に対しプロジェクトの計画、運営について、相互の合意を得ることを目的としてPDMを適用する提案が行われ、1997年2月の実施協議調査団の協議の結果、PDMが作成された（PDM₀）。

PDMは、その性格上、プロジェクトの進行に合わせ、関係者の合意の下、改善や修正をされていくのが通常のプロセスである。本プロジェクトでは、2000年2月の巡回指導調査団が中間評価を実施し、その結果、PDMが改訂された（PDM₁）。この際の変更点は以下の5点であった。

- (1) インカムジェネレーション活動の明示
- (2) 委員会活動によるプロジェクトの運営活動の明示
- (3) 夜間養成訓練のプロジェクト活動としての明確な位置づけ
- (4) 徒弟訓練の位置づけの明確化
- (5) 監督官庁の変更（労働社会福祉省から教育・スポーツ省への移管）

今回、終了時評価調査団は、評価のために評価用PDMを作成した（PDME）。PDMEは、PDM₀、PDM₁を基に作成され、新たにターゲットグループを「ナカワ職業訓練校のカウンターパートと訓練生」とすることを明示した（付属資料2．「PDME」及び付属資料3．「PDMの変遷」参照）。

2 - 2 主な調査項目と情報・データ収集方法

PDMEに基づいて、実施状況の確認及び評価5項目（妥当性、有効性、効率性、インパクト、自立発展性）の観点から評価を行うため、調査項目、情報・データ収集方法を、以下のとおり設定した。

評価項目	調査項目	必要なデータ	調査方法
1. 妥当性	ウガンダ国政府職業教育訓練政策	政策	・資料レビュー（政策） ・インタビュー（教育・スポーツ省）
	DIT政策	DIT政策	・資料レビュー（DIT政策） ・インタビュー（DIT）
	産業界のニーズ	統計データ（分野別企業数等） 通産省・労働省政策	・資料レビュー（通産省・労働省政策） ・現地コンサルタントによる調査
	卒業生の就職状況	卒業生の就職数、就職会社リスト	・資料レビュー（プロジェクト報告書）
2. 有効性	我が国の援助政策との整合性	援助方針	・資料レビュー（外務省、JICA資料） ・インタビュー（大使館、JICA）
	インカムジェネレーション活動収入	インカムジェネレーション活動収支一覧	・資料レビュー（校資料、会計書類）
	イントラネットでの教材共有化	教材データ	・資料レビュー（イントラネット） ・インタビュー
	カウンターパートへの技術移転達成度	カウンターパート評価	・資料レビュー（カウンターパート査定） ・インタビュー（専門家、カウンターパート）
	訓練生の成績	DITのTrade Test結果、 UNEB 試験結果	・資料レビュー（試験結果）
	シラバス、カリキュラム	シラバス、カリキュラム	・資料レビュー（プロジェクト資料）
	養成訓練の応募状況	応募者数	・資料レビュー（校資料）
	卒業生数	卒業生数	・資料レビュー（校資料）
3. 効率性	他職業訓練校との比較	他職業訓練校実績	・資料レビュー（他校資料、ドナー資料） ・インタビュー（他校、ドナー）
	専門家派遣時期、技術移転内容	専門家派遣実績 技術移転内容	・資料レビュー（プロジェクト報告書）
	卒業生の就職状況	卒業生就職実績	・資料レビュー（プロジェクトが就職実績調査を実施済み）
	カウンターパートの選択、研修、研修内容	カウンターパート配属表 カウンターパート研修実績	・資料レビュー（プロジェクト報告書） ・インタビュー（専門家、カウンターパート）
	カウンターパートの能力	カウンターパート評価表	・資料レビュー（評価表） ・インタビュー（専門家、カウンターパート）
	管理要員の配置	管理要員配置記録	・資料レビュー（校記録）
	機材選定、供給時期	機器リスト	・資料レビュー（プロジェクト報告書）
	現地業務費	現地業務費使用実績	・資料レビュー（プロジェクト報告書）
4. インパクト	訓練実績	訓練実績表	・資料レビュー（プロジェクト報告書）
	向上訓練委託企業	向上訓練委託企業リスト	・資料レビュー（プロジェクト報告書）
	校外セミナー	セミナー実績リスト	・資料レビュー（プロジェクト報告書）
	連携訓練	連携訓練実績表	・資料レビュー（プロジェクト報告書） ・インタビュー
5. 自立発展性	ジェンダーへの配慮	訓練生の性別	・資料レビュー（校資料）
	ウガンダ国政府からの補助	ウガンダ国政府予算配分	・資料レビュー（校資料） ・インタビュー（大蔵省、教育・スポーツ省）
	校運営費	校運営費収支表	・資料レビュー（会計資料）
	インカム活動	インカム活動実績	・資料レビュー（校資料、会計資料）
	職員採用計画	職員採用計画	・インタビュー（教育・スポーツ省）
	カウンターパートの定着	カウンターパートの定着率	・資料レビュー（プロジェクト報告書） ・インタビュー（専門家、カウンターパート）
	イントラネットの普及	イントラネット利用状況	・インタビュー（専門家、カウンターパート）

教育・スポーツ省が実施する試験で、合格者にはCollege及び大学Diplomaコースの入学資格が与えられる。

上記の調査項目による調査結果は、付属資料4.「評価グリッド(調査結果表)」に取りまとめた。

第3章 調査結果

本調査団は、2001年10月28日から11月11日までの日程でウガンダ国を訪問し、「ナカワ職業訓練校プロジェクト」に係る終了時評価調査を行った。調査並びに評価結果はミニッツ(付属資料1)に取りまとめ、ウガンダ国側と署名を取り交わした。

本調査団がプロジェクトの実施状況を確認した調査結果は、以下のとおりである。

3 - 1 プロジェクトの実施体制

(1) カウンターパートの配置状況(付属資料6.「カウンターパート配置実績表」参照)

ナカワ職業訓練校は、校長、副校長以下82名の職員(うち管理部門を含むカウンターパートは50名)を配置している。R/Dでは、協力対象の7科それぞれに6名のカウンターパート(全科で42名)を配置することとされているが、現状は電子科6名、電気科6名、機械科5名、自動車科8名、木工科7名、板金科7名及び溶接科6名の45名体制で、機械科のインストラクターに1名欠員がある以外はすべて配置されており、人数的に大きな問題はない。しかし、カウンターパートの入れ替えが多く、技術移転上の問題となっている。特に木工科においては、科長、インストラクター2名が2000年に入って配置されたばかりであり、技術移転が遅れる原因となっている。

カウンターパートの入れ替えが多い一因としては、一部のカウンターパートの身分が臨時職員であることがあげられる。カウンターパート50名のうち、正職員は17名であり、33名は校採用職員である。校採用職員は身分が不安定で、離職率が高いことから正職員への転換が望まれている(正職員、校採用職員の内訳は表3-1のとおり)。この点、教育・スポーツ省から2001年度に10名の正職員を採用するとの方針が示されたことは評価される。

なお、今回募集される正職員インストラクターの資格要件としては、機械・電気工学分野の Ordinary Diploma を有すること、又はクラフトマン Trade Test において Advanced Certificate を取得し、3年の実務経験のあること、技術・職業教育においてインストラクター又は技術指導員の資格を有すること、以上2つの条件を両方とも満たしていることが求められている。

ナカワ職業訓練校においては、についてはアシスタントインストラクターを含めた全指導員が条件を満たしているものの、一部のカウンターパートは の条件を満たしていない。しかし、プロジェクトに対する特例措置として、以下の条件を満たしていれば と同等の資格を有すると認められているので、事実上すべてのカウンターパートについて条件が満たされているといえる。

- ・プロジェクト予算で研修を受けている者

- ・ PROTS研修を修了している者
- ・ チーフテクニカルアドバイザーと校長が推薦する者

ただし、この特例措置は引き続きとられるとは限らず、今後は既存インストラクターも上記のような資格保持が求められる可能性もあるため、教育・スポーツ省の動きを注視していく必要がある。

表3 - 1 正職員、校採用職員の割合（単位：名）

科	管理部門	電子	電気	機械	自動車	木工	板金	溶接	計
正職員	4	1	1	2	2	4	2	1	17
校採用職員	1	5	5	3	6	3	5	5	33
計	5	6	6	5	8	7	7	6	50

校長、副校長含む

正職員：国家公務員（Public Service Commission又はEducation Service Commissionにより採用される）

校採用職員：ナカワ職業訓練校採用、給与の予算は教育・スポーツ省より特別に付与されている。

(2) 機材の据付・整備状況

すべての科における無償及び技協供与機材については、据え付け及び整備が行われており、特に問題は見当たらなかった。前回の技術協力で供与した機材のうち一部が現在も使用されており、30年以上も前の機器が、本プロジェクトの専門家、現地スタッフの整備により、今なお稼働しているのは耐用年数を勘案すると特記すべきことである。

なお、インカムジェネレーション活動には、養成訓練等に有効な範囲で取り組んでいるが、供与機材を使用していることから、使用頻度が多い機材については、機器や刃物の消耗が進んでいることが見受けられた。

全般的に現地ニーズに合った、現地の工場においても使用されている基本的な機械が導入されている。機械科においては、NC機能のついた平面研削盤も設置されているが、将来ウガンダ国内に導入される際に役立つため、操作方法が指導されている。なお、NC装置は平面研削盤の導入に際して、日本国内で生産されるほとんどの平面研削盤に標準装備されているために導入されたものであり、当該平面研削盤のNC装置は他の工作機械のものとは違い、極めて簡易なものであり、ウガンダ国の実状にマッチしたものである。

(3) 訓練用教材・資材の調達状況

訓練用教材や資材の調達には、各科の科長が教材・資材計画書を作成したうえ、経理課に提出して教材等を受け取る手順をとっているが、プロジェクト開始当初はウガンダ国側の財政的な理由により計画書に基づく教材等が購入されていないことが多かった。現状では、インカムジェネレーション活動による収入や向上訓練の受講料収入が、教材等の購入費に充て

られるようになり、訓練実施に必要な教材が用意されている。

なお、養成訓練課程の教材等は基礎的技能の習得が主であることから、インカムジェネレーション活動で出た廃材等を教材に活用するなどの工夫もされている。

(4) 訓練計画・管理状況

訓練校運営・管理全体にかかわる各種委員会（校運営、訓練生管理、安全衛生、訓練機材、訓練のプロモーション及び校外活動の6委員会を設置）の設置・運営やイントラネットを活用した校運営、訓練実施の改善（教材作成、指導技法向上等）など、訓練計画・管理に関する基礎的な技術は、長期・短期専門家によりカウンターパート（校長・副校長・7科の科長）に対しておおむね移転されている状況である。

しかしながら、このような計画・管理は、ウガンダ国において初めてのコンセプト・経験でもあり、今後校管理・運営方針等の変更が生じた場合には、その状況に応じた技術移転が必要になるであろう。特に訓練計画・管理において重要なファクターの1つであるネットワークシステムについては、基礎的なノウハウが移転された段階で、現在なお継続的に技術移転が行われている状況であるため、今後引き続きプロジェクトリーダー、各専門家が訓練計画・管理に積極的に関与するとともに、必要な場合には短期専門家の派遣等により適宜技術移転を行っていくことが望まれる。

3 - 2 プロジェクトの投入実績

3 - 2 - 1 ウガンダ国側投入

(1) 施設整備

ナカワ職業訓練校の建物は1968～1974年に実施された我が国のプロジェクト方式技術協力「ウガンダ職業訓練センタープロジェクト」により建設されたが、今回、無償資金協力により既存の実習場2棟、管理講義棟、訓練生寮2棟、食堂が補修され、実習場1棟と訓練生寮2棟が新設された。実習場、寮共に清掃がよくいきとどき、環境が整えられていた。

ウガンダ国側の投入による施設は、施設周辺フェンス、自動車科ガレージ（建設中）、倉庫3棟（2棟完成）等の新設、管理講義棟の塗装であり、2001年までの実績は、3億8,200万U. Shs.（Uganda Shillings）（約2,674万円）である。

(2) カウンターパート配置状況（付属資料6.「カウンターパート配置実績表」参照）

現在、ナカワ職業訓練校に配置されているカウンターパートは、校長、副校長以下科長、インストラクター、アシスタントインストラクターなど合計50名である。機械科で1名のカウンターパートの欠員がある以外、すべて配置は完了している。

しかし、50名中正職員は17名に過ぎず、残る33名は校採用職員である。校採用については、給与は政府予算より支出されているものの、雇用身分は不安定であるため退職者も多い。今回の調査で新たに10名の正職員が採用される計画が確認され、ウガンダ国側の努力は評価される。

(3) 予算措置状況（付属資料7.「ナカワ職業訓練校運営費収支状況表」参照）

ナカワ職業訓練校の運営は、政府予算〔2001年6月までの累計で11億4,742万U. Shs.（約8,032万円）：71%〕、訓練費収入〔3億2,860万U. Shs.（約2,300万円）：20.3%〕、インカムジェネレーション活動収入〔約1億4,069万U. Shs.（約9,849万円）：8.7%〕により賄われている。なお、正職員の給与は教育・スポーツ省より直接支払われている。

政府予算は、Capital Development Fund〔2001年6月までの累計で9億4,764万U. Shs.（約6,634万円）〕と Recurrent Expenditure〔1億9,979万U. Shs.（約1,399万円）〕に分類される。前者は、施設・設備費、固定資産、臨時雇用費、旅費等の手当、人材開発費、車両保守管理費、消耗品、光熱費等の費目で支出されており、後者は、寮の食料費、燃料費等の費目で支出されている。

政府予算の問題は、歳入不足のため、毎月の予算執行が滞りがちであることで、1997年7月以降48か月中23か月で予算執行がなかった。最長は、1998年3月から12月まで、10か月にわたり予算執行がなく、校運営に大きな影響を与えた。現在も事態は改善されておらず、2001年も1月と3月は予算執行がなかった。また、予算執行がある月でも、供与機材受け取りに係る機材通関費用が差し引かれる月があるなど、収入が安定しないことから、校經理の円滑な運営に支障が出ている。2000～2001年度の政府予算（Capital Development Fundのみ）は、3億2,500万U. Shs.（約2,275万円）であったが、実際に執行があったのは2億2,747万U. Shs.（約1,593万円）にとどまった。2001～2002年度の政府予算申請額は2億9,900万U. Shs.（約2,093万円）であるが、調査当時確定していたのは、9,970万U. Shs.（約698万円）のみであり、予算措置については今後も注視する必要がある。

このような状況下、ナカワ職業訓練校ではインカムジェネレーション活動を訓練（実習）に有効である限り積極的に行っている。そこでの収入のストックがあったゆえに、例えば国からの給料遅配が全国的にみられ、他校では教官のストライキを招いたときにも、ナカワ職業訓練校ではそのストックから暫時給料を手当することができ、ストライキ等の状況を回避することができた。資材購入等でもインカムジェネレーション活動の収入は役に立っている。予算の遅配自体は回避されるべきものではあるが、しかしながら、後発開発途上国（Least among Less Developed Countries：LLDC）において国家予算はどこも厳しく、ウガンダ国においても同様な状況のなか、校独自でできる限りの対応を行っていることは

評価できる。

なお、教育・スポーツ省は、ナカワ職業訓練校以外の職業訓練校の校採用職員の給与については付与せず、各校独自で賄うべきものとしているが、ナカワ職業訓練校のみに対しては、校採用職員の給与も国の予算で賄っている。

一方、養成訓練の訓練費収入は、訓練生採用数が増加するか、訓練費を値上げしない限り増収は望めないことから、今後も向上訓練、インカムジェネレーション活動による収入の確保は必要と判断される。校長の話によると、訓練費の値上げを検討しているとのことであった。なお、訓練費は学校のレベル（中等、高等等）によって教育・スポーツ省による目安が定められている。ナカワ職業訓練校は同等の職業訓練校に比しても安価に設定されており、教育・スポーツ省も、校自身も、値上げをする余地があると考えている。

3 - 2 - 2 日本側投入

(1) 専門家派遣（付属資料8.「専門家派遣実績」参照）

長期専門家については、当初はチーフアドバイザー、調整員、訓練計画専門家、7学科専門家の10名体制であったが、訓練計画専門家の派遣終了、電子・電気科、板金・溶接科の兼務により、現在は7名体制となっている。長期派遣専門家の派遣実績は交替も含め17名となった。

短期専門家については、調査団派遣時点で指導技法、塗装、配管、視聴覚技法、冷凍空調、ネットワーク構築など延べ11名を派遣しており、今後は、制御センサー、ネットワークシステム構築、自動車板金分野等の専門家派遣を予定している（日本人専門家のみならず、非破壊検査についてはエジプトから第三国専門家を派遣した実績がある）。

この結果、長期専門家、短期専門家を合わせ、プロジェクト終了までに519人/月の派遣実績となる予定である。

(2) 研修員受入れ（付属資料9.「カウンターパート研修受入実績」参照）

カウンターパートの研修は、訓練管理、金属加工技術、電子工学、電気工学、機械加工、自動車整備、造形工学、板金技術、溶接技術等の分野で、合計53回（304.5人/月）実施された。複数回受講したカウンターパートもあり、受講者は46名である。

主な研修受入れ先は、職業能力開発総合大学校、ポリテクセンター千葉等の我が国研修機関のほか、エジプトのCentral Metallurgical Research and Development Institute (CMRDI)、ケニアのジョモケニヤッタ農工大学での第三国集団研修も実施された。

(3) 機材供与 (付属資料 1 . 「ミニッツAnnex3.3」及び付属資料10. 「主な供与機材管理及び技術移転状況」参照)

ナカワ職業訓練校の主要機材は、電気科、機械科、自動車科、溶接科については無償資金協力により供与されており、プロジェクト方式技術協力では、電子科、木工科、板金科について供与された。

プロジェクト方式技術協力で供与された機材は、到着が遅れたため、3科の訓練は当初1998年10月に開始される予定であったが、1999年5月に延期された。

供与された機材の据え付けは良好に行われ、保守管理も円滑に実施されている。

3 - 3 プロジェクトの活動実績

3 - 3 - 1 プロジェクトの実施プロセス

内容は付属資料21. 「プロジェクト経緯表」参照。

3 - 3 - 2 訓練コース実施状況

訓練内容詳細は付属資料11. 「各科訓練概要」のとおり。実績については付属資料12. 「訓練生数及び訓練時間数実績」を参照。

(1) 養成訓練 (付属資料13. 「シラバス (サンプルとして機械科分を添付)」、14. 「新旧カリキュラム対照表 (電子科、自動車科)」参照)

1998年に先行4科(電気、機械、自動車、溶接)で訓練を開始して以来、4年間で昼間465名、夜間461名、合計926名の訓練を実施しており、既に昼間181名、夜間111名、合計292名が訓練を修了している。訓練開始当初は一部の学科において定員割れもみられたが、応募者は年々増加しており、現在では2.35倍の倍率となっている。聞き取り調査によると、主な入学希望動機は最新設備が整っていること、実技訓練が多いこと、寮があることなどがあげられた。寮があるために、首都カンパラ市外の生徒を多く受け入れ、その割合は全訓練生の90%程度にも上っており、ほとんどの生徒に寮が提供されている。一方、同じカンパラ市内にあるルゴゴ職業訓練校の訓練生は、50%がカンパラ市の出身者であり、役割分担がなされている。

供与機材の到着の遅れ、カウンターパートの退職等が重なった木工科については、技術移転等が終了していない分野(作業工程管理、メンテナンス技術等)が多い。付加価値の高い木工家具を加工できる技能習得が重要であることから、既に技術移転が終わっている単品の木工加工の技能を土台として、複数の材料を組み合わせる家具製品として仕上げる作業、複数の職能を組み合わせる全体の工程を管理する能力を習得するためには、プロジ

ェクト終了時期から少なくとも2年間の期間を要すると考えられる。

また、技術革新の急激な進展によりカリキュラムの変更を行った電子科及び自動車科においては、新たな機材の追加整備とこれらの機材を使用した技術移転が必要であり、その移転については少なくとも1年は必要である。

その他の4科については、プロジェクト終了時には養成訓練課程の実施に係る技術協力をおおむね終了する見込みとなっているが、一部の分野については、更なる技術移転が必要であり、その場合短期専門家の派遣及びカウンターパート研修による協力で対応が可能と考えられる。

昼間の訓練生については、181名中147名(81.2%)が職業訓練局(Directorate of Industrial Training : DIT)の主催するTrade Test(合格者にはCraftsman Certificateが授与される)に合格しており、職業訓練校のなかで最も高い合格率である。また、UNEB(教育・スポーツ省が主催する試験で、合格者にはCollege及び大学Diplomaコース入学資格が与えられる)の結果はまだ1回しか出ていないが、受験96名中44名(45.8%)が合格している。この数字は公共職業訓練校3校のなかでは第2位の数字である。

ジェンダーに配慮し、各科定員には5名の女性枠が設けてあり、電子科(全訓練生57名中14名24.6%)、電気科(77名中19名24.7%)、機械科(77名中8名10.4%)、自動車科(80名中3名3.8%)で訓練実績がある。ただし、女性の応募がない科、選考に際しての面談の結果、応募者の希望と訓練内容が違うと判断され、入校に至らないなどもあるため、必ずしも全科に5名の女性がいるわけではない。

卒業生の多くは、官公庁、民間企業に就職し、進学する者も数%いる。就職率は、2000年3月卒業生65.8%(73名中48名)、2001年3月卒業生50.9%(108名中55名)である。他の職業訓練校は卒業生の調査をしておらず直接比較する数字がないが、ウガンダ国の失業率7.4%(1997年)を考慮すると、良好な数字といえよう。なお、2001年3月卒業生の就職率が低いのは、まだUNEBの試験結果が発表されておらず、発表後リクルート活動を行うためだが、専門家によると2001年3月卒業生は2000年3月卒業生より成績が優秀なので就職率はより高くなるであろうとのことであった。就職先民間企業リストを見ると大手企業が多く、優良企業に就職した者が多いことが分かる。

(2) 向上訓練(付属資料1。「ミニッツAnnex7」参照)

向上訓練は、主に企業からの要請等に基づき養成訓練科目の一部を基本に、1998年以来86コース、523名、延べ約5万時間実施されている。プロジェクト開始直後は、訓練校の要である養成訓練に重点を置く考えから向上訓練はあまり行われていなかったが、養成訓練が軌道に乗った2000年以降は産業界のニーズに応える意味から積極的に向上訓練を実施し

てきており、国連工業開発機関（UNIDO）、米国国際開発庁（USAID）、NGO等との連携訓練も実施している。顧客は、警察、空港公団、厚生省等の官公庁のほか、砂糖精製会社、飲料会社、ゼネコンなど大手企業が名を連ねている。

向上訓練の実施は、各科間でその実績にばらつきが出ているものの、施設での収入源としてもその実施の意義は大きい。その収入は訓練費収入の23.2%を占め（1997～2001年累計4億800万U.Shs. = 約2,856万円中9,500万U.Shs. = 約665万円）重要な収入源となっている。ウガンダ国内において他の職業訓練施設で未実施の向上訓練コースに人気が集まることから、まさしく本プロジェクトが社会に対して直接アピールできる事業であり、養成訓練課程の訓練生の就職にも良い影響を与えるものである。

現地有識者との意見交換会の席上では、各向上訓練受注元企業からナカワ職業訓練校の向上訓練は、設備が整っていること、技術レベルが高く常に最先端技術を提供すること、また技術面ばかりでなく、訓練を受けた従業員の仕事への取り組み姿勢にも変化をもたらすことから、今後も継続して訓練を委託したいとの評価が寄せられた。ウガンダ第1のビール会社であるナイルビールは、従来は南アフリカで実施していた向上訓練を、ナカワ職業訓練校で行うことに切り替えている。生産ラインのメンテナンスを自社要員でできるようになったなどの具体的な成果も現れている。地域の指導者の育成に取り組んでいるUNIDOからは、ナカワ職業訓練校で指導される技術レベルは高すぎることなく、地方の技術者の指導に十分役立つものであるとの発言があった。

今後、これまでの主として企業ニーズに基づいたテーラーメイド型訓練（受注型向上訓練）の充実はもとより、広く市場ニーズに基づくレディメイド型訓練（定型型向上訓練）の開発実施が必要なことから、これらの分野の更なる技術協力が求められるところである。電子科においては既にレディメイド型のパソコン研修（ハード、ソフト共）が行われているが、特記すべきことは、大部分の受講者が会社ではなく、個人で受講を申し込み、受講料を自己負担していることである。さらに、受講者のなかにはマケレレ大学の卒業生も多く、実習の多いナカワ職業訓練校の訓練内容は、ウガンダ国の一流大学を卒業した技術者からもニーズがあり、その評価は高いといえる。

(3) 徒弟訓練

徒弟訓練については、2000年2月の中間評価調査において、DITの責任で募集・実施されることが明らかになり、徒弟訓練実施のための予算が確保されるなどの動きがあれば、実施の見込みがあると判断されていた。

しかし、そのあともDITからの要請はなく、結局実施されなかった。これは、後述するとおり、省庁再編により、DITの教育・スポーツ省における位置づけが流動的になったこ

とが一因と考えられる。

3 - 3 - 3 分野別活動状況（付属資料15.「技術移転達成表」及び付属資料16.「教材作成状況一覧表」参照）

(1) 電子科

プロジェクト開始当初に作成したカリキュラムに基づく科目の技術移転は、ほぼ終了しているといえるが、アナログ回路のうちトランジスタを使用した複雑な回路（応用回路）の動作原理の理解や修理技術は十分とはいえない。加えて、アナログ回路を集積したIC（OPアンプ）については、今後の重要な技術移転内容となる。

また、当初カリキュラムを改訂するに至ったウガンダ国内の産業界のニーズ変化によるコンピューター制御回路、並びにパーソナルコンピューターのハードウェア及びソフトウェアの科目は、関係する機材が整備されていないこともあり、技術移転が十分行われていない。世界的なIT技術の進展のなか、ウガンダ国も例外ではなく、先進国の進展と違いはあるものの、急速にIT技術が入り込んできている。光ファイバー等のインフラ整備にも国策として取り組んでいること自体、その進展を支える側面である。これらに対応する様々な人材の育成が求められているウガンダ国において、中学校卒業程度（Oレベル以上）の養成訓練コースを実施するナカワ職業訓練校の電子科では、少なくともアナログ技術、デジタル技術、コンピューター技術をバランスよく習得した人材の育成が求められる。

(2) 電気科

主要な職能である電気工事や電動機に加え、本プロジェクトで新たに加えられた冷凍空調設備に係る技術移転は順調に進んでおり、プロジェクト終了時には、ほぼ終了する見込みである。

ただし、冷凍空調設備で自動制御される特殊モータ及びPLC（プログラマブル・ロジック・コントローラ）を使った自動制御回路については、養成訓練も含めて向上訓練のニーズが十分期待できるため、今後引き続き技術移転がなされればより有効であろう。

(3) 機械科

当初の訓練目標に基づいた機材設置・選定、保守管理、教材の作成、コース開発（向上訓練等）指導技法等に係る技術移転は、おおむね問題なく進展している。機械加工に係る各種工作機械の技術移転は、万能工具研削盤と平面研削盤に関し、いまだ十分に技術移転されていないが、残り6か月間で技術移転を完了する予定である。

また、機械のメンテナンスはもとより、軽微な故障修理の技術移転も順調に進んでいる。

ウガンダ国の機械加工については、機械が故障した際の修理部品の製作作業がほとんどであることから、現行のカリキュラムで機械加工分野の需要を十分満たす訓練内容となっている。ただし、今後、ウガンダ国の機械加工産業が進展して、精度の高い同一規格製品の大量生産等に対する需要が発生すれば、数値制御された機械（マシニングセンター等）及びそれに付随するCAD/CAMなどに係る専門技術・技能も必要となっていくであろう。

保守管理に関する1例として、機械操作の取り扱いが悪く、旋盤の部品が破損したが、その部品を鋼から製作するなど、修理技術の移転も実施している。故障したときの部品が入手できない場合の対処方法を指導するなど、自立発展性への展開につながるものである。

(4) 自動車科

自動車科の当初訓練内容は、クラフトマンレベルに必要な全般的な自動車整備の技術・技能（原理、構造、機能等）を中心とし、それに内燃機関学（エンジン性能等）、自動車工学（自動車性能等）等の科目で補完されていた。

しかし、電子制御式エンジン車、AT（オートマチックトランスミッション）装着車が、ここ2～3年の間に急激にウガンダ国に輸入されてきている現状にかんがみ、現在、プロジェクト開始時の訓練内容（シラバス、カリキュラム等）を変更して対応している状況である。専門家を中心に、インカムジェネレーション活動等で対症的に電子制御式エンジン、ATの修理法等の技術移転は行ってきたが、カウンターパートに対してそれらのシステム構成、部品構造、各機構等を本格的に技術移転する必要があり、現在までの技術移転内容（エンジンの基本構造、基本整備等）を考慮すれば、プロジェクト終了後引き続き最低1年間は技術移転が必要と考えられる。

自動車科の養成訓練、向上訓練、インカムジェネレーション活動で使用する消耗品、部品等は、材料そのものではなく加工後の完成品であるため、製作できない部品等が多く、その入手状態が、訓練自体に大きく影響を与える側面がある。最近では、特殊な部品や車種限定の部品などを除き、ほとんどの消耗品や部品等がウガンダ国内に流通しているが、今後の自立発展のためにも、特殊部品等を隣接国やヨーロッパ等から部品調達する道の模索も、訓練を支える重要な一面となる。

(5) 木工科

カウンターパートの退職等により同じ内容を再度技術移転する必要があったことから、技術移転進捗状況は最も遅れている。木工板単品による加工、や簡単な仕上げ加工に関する技術移転は十分進んでいるが、複数の木工板の組み合わせ加工、及び表面仕上げや木工塗装等の家具製造に係る技術移転はこれから取りかかる状況である。

具体的には、各種継ぎ手加工機、加圧機、超仕上げかな盤の操作、木工塗装、木工工作機器のメンテナンスに必要な刃物研削、そして木加工全体の作業工程管理など、付加価値の高い家具の製作に不可欠な職能の技術移転は十分ではなく、その指導範囲が広いことから、技術移転には最低2年必要であると判断される。

現状では、高品質の家具は輸入品に依存しているが、高度な加工技術を身に付けた人材を育成することにより、ウガンダ国内において、ウガンダ国で採れる良質なマホガニー材を使った付加価値の高い家具が製作されるようになることが期待される。

(6) 板金科

板金作業に係る機材設置・選定、保守管理、教材の作成等の基本的技術移転はおおむね終了していると考えられる。配管作業は短期専門家により技術移転が行われたが、材料、配管種類など様々な技術移転内容があり、1か月間と短期間であったため、基礎的な技術移転内容となり、十分とはいえない。このため、今後もトピックスによっては何らかの支援が望まれる。また、鋳造・鍛造、熱処理技術等についても、短期専門家派遣等による技術移転がなされれば望ましい。

(7) 溶接科

各種溶接・溶断作業については技術移転が終わっている。製品の良否を判断するために必要な非破壊検査については、機材などが整備されていないこともあり、今後訓練の必要性が生じることが予想される。基本的にステンレス溶接、アルミニウム溶接等を行うMIG・TIG・MAG溶接機の簡易な保守管理は可能である。しかしながら、それら溶接機の根本的な部品が破損した場合、財政事情等によりその入手が困難となったり、また訓練実施に影響を与えるおそれがある（本件は全科に共通した問題である。入手に関し情報を整備するよう指示した）。

なお、板金科、溶接科で厚板、薄板用のシャーリングマシンを保有しており、特に13mmの厚板を切断するこの機械はウガンダ国内では貴重であり、現在インカムジェネレーション活動のメインで稼働状況が激しい（スペアパーツである大型の刃の予備は、現状で各2個ずつの状態）。

3 - 3 - 4 UNIDO、NGOとの連携

3 - 3 - 2 (2)向上訓練の項で述べたとおり、ナカワ職業訓練校では訓練の一環として、NGOとの連携を積極的に行ってきた。

2000年に実施されたUNIDO、NGOとの連携訓練の成功は校経営上大きな意義をもち、各科カ

ウンターパートに自信をつけさせ、そのあとの向上訓練の活発化の契機となっている。

なお、ウガンダ国の産業政策では中小企業や自営業の振興も重視されているが、UNIDOではこういった政策に沿った小規模自営業者の育成をナカワ職業訓練校と連携して行っている。ナカワ職業訓練校が技術的側面からの訓練を支援する一方、UNIDOはマネジメント面の講習を実施している。そうした連携のなかから、ナカワ職業訓練校でも訓練に上記のようなマネジメント面での内容を盛り込むことが望ましいとの判断が生まれ、UNIDOにカウンターパートに対するマネジメント研修を実施してもらい、その内容が2002年から養成訓練に取り込まれる予定である。これはカリキュラムの改善にもつながっている。

また、連携訓練により、収入も飛躍的に向上することができた。JETRO主催の見本市にナカワ職業訓練校はブースを出店した。これらのこともウガンダ国側（インストラクターだけでなく、訓練生も含めて）の、モチベーションを向上させることとなったと思われ、オーナーショップを形成する1つの材料になったと考えられる。

(1) UNIDOとの連携

UNIDOが実施する「ウガンダ国の特定地域における零細・中小企業振興」プログラム
〔 Micro and Small scale Enterprises (MSE) Component 〕との連携

1) 訓練の目的と内容

MSE Componentに含まれる零細・中小企業者育成を目的としたMaster Craftsman Programme(MCP)への協力として、電気/電子、木工、金属加工分野でのMaster Craftsman 養成訓練の実施

UNIDOからの委託による向上訓練実施実績

訓練実施学科	実施年月日	対象	期間	訓練生数
電子科	2000. 8.14 ~ 2000.10. 6	UNIDO	4.0週間	3名
電気科	2000. 8.10 ~ 2000. 9.20	UNIDO	6.0週間	13名
機械科	2000. 9.18 ~ 2000. 9.29	UNIDO	1.0週間	21名
木工科	2000. 8.14 ~ 2000. 9.22	UNIDO	5.5週間	22名
板金科	2000. 8.28 ~ 2000. 9. 6	UNIDO	2.0週間	21名
溶接科	2000. 8.14 ~ 2000. 9.29	UNIDO	3.0週間	18名

2) 訓練の成果

MSE Componentの対象地区として選定された7つの地区(Lira, Mbale, Mbarara, Kabarole, Mityana, Mubende, Masaka) から4職種55名のMCP Advisor候補生が参加して訓練が行われ、訓練修了後にそれぞれの地区でMCP Advisorとして活動を続けている。現在もMCP Advisorの活動の成果について、UNIDOがモニタリング中であり、詳しい評価結果を受け

ていないが、UNIDOのカンパラ事務所からはおおむね良好な活動状況と聞いている。

3) 今後の協力

UNIDOが1年間のモニタリング後に結果を評価し、そのあとの協力の可能性について協議する予定。

(補足)

- ・MSE Componentに含まれる零細・中小企業者育成を目的としたEntrepreneurship Training Programmeの一環として、UNIDOスタッフによって、ナカワ校指導員（電気、機械、溶接、電子、木工科、計8名）に対するBusiness Managementの教授法指導が行われた。

4) 期 間

2001年3月26日～2001年5月5日までの期間中内3週間で実施。

5) 成 果

ナカワ校訓練生を最終ターゲットとして、卒業後の独立自営支援を目指す同計画を受けて、これまで外部講師を招いて訓練生に対する指導を行っていた「Business Management」のクラスを、ナカワ校指導員が自ら担当できるようになった。また、「Business Management」の学習時間数をそれまでの3倍に増やすカリキュラムの見直しも合わせて行った。

(2) SASAKAWA GLOBAL 2000 (NGO) との連携

Training on Manufacturing and Servicing of Agro-Processing Equipment との連携

(for Cassava and other Root & Tuber Crops)

1) 訓練の目的と内容

ウガンダ国のRural Areaに在住する女性の自立支援を目的としたプログラムへの協力として、15名のテクニシャンに対して、キャッサバ等の農産物を加工する機材制作に関する向上訓練を実施した。

訓練実施学科	訓練生数
機械科	7名
溶接科	3名
板金科	3名
木工科	2名

2) 期 間

2000年10月10日～2000年11月4日

3) 成 果

訓練終了時にウガンダ国内で手に入る資材を用いて制作された各種農産物加工用機械成果品のデモンストレーションが行われたが、SASAKAWAGLOBAL2000の担当者から「制作費や実用性共に満足である」との評価を得ている。

同計画に対して、本プロジェクトが求められた協力に関する成果達成率は100%である（同計画は日本財団とカーター財団が共同で実施しており、2001年6月6日、カーター財団会長である元アメリカ合衆国大統領カーター氏が、ナカワプロジェクトを視察し、その際ナカワ校訓練生に対して「日本が援助するナカワ校で学んだ技術に自信をもって、ウガンダ産業界を担う人材たれ」と激励のスピーチを行った。）

3 - 4 プロジェクトをとりまく環境

(1) ウガンダ国の職業教育訓練政策

ウガンダ国では1998年よりEducational Strategic Investment Plan (ESIP) に沿った教育政策が実施されており、Medium Term Budget Frameworkに反映されている。

2000/2003年の優先政策は、「前初等教育の国レベルの目標と目的の定義と初等教育の再定義」、「中等教育に対する高次の目標と高まる期待に応える国レベルの目的と目標の再定義」、「適切な高等教育の実現を確保し、定義するための高等教育評議会の設置」、「市場のニーズに対応したキャリア上昇の幅広い進路を提供し、職業訓練をより魅力的なものにするため、技術とビジネス教育を統合する構造的な教育課程の変革」等となっている。

この優先政策のなかでも最優先されているのは、無料初等教育である。初等教育無料化政策による初等教育は1997年に開始され、2003年に第1回生が卒業することになっている。このため、2003年以降輩出される大量の初等教育修了レベルの人々に対する地域に根ざした技能訓練が、次の優先課題としてあげられている。教育・スポーツ省では、初等教育修了者を対象として約800か所の技能訓練機関「地域工芸学校 (Community Polytechnics)」の展開を開始している。

(2) 組織問題

1998年に行政改革の一環で、職業訓練が教育のカテゴリーとして扱われることとなり、本プロジェクトの所管省庁は労働社会福祉省から教育・スポーツ省へ移管された。これにより、ナカワ職業訓練校は職業教育・訓練を管轄する部署商業・技術・職業・教育訓練局 (Department of Business, Technical and Vocational Education & Training : BTVET) の下に置かれることとなった。同時にナカワ職業訓練校はDITの監督下にあるが、2000年2月の中間評価調査時点と同様、現在に至っても、DITの教育・スポーツ省内における位置づけ、DITとBTVETの関係は

検討中のままとなっており、ナカワ職業訓練校は、DITとBTVETの関係が不明確ななかで、双方の監督を受ける形になっている（例えば、予算はBTVETから配付される一方、Trade TestはDITの所管となっている）。

(3) 産業界のニーズ

この影響を受けたのは徒弟訓練である。2000年2月の中間評価調査においてDITは、徒弟訓練の予算を確保したうえで、ナカワ職業訓練校に対して徒弟訓練の要請を行うこととPDM上変更されたが、結局予算が確保できず要請は行われなかった。なお、ナカワ職業訓練校への予算は、BTVETにより確保されており、DITの移籍は養成訓練に影響なかったと判断される。

ナカワ職業訓練校では、2年生時に企業内訓練（応用実習）を実施しているが、受入先企業では、ナカワ職業訓練校訓練生の技術力を高く評価しており、即戦力として採用する企業が多い。例えば、鉄道車両工場では、モーター巻き線ショップ新設にあたり、2001年3月の電気科卒業生を3名採用している。先述のように向上訓練では企業でニーズの高い、進んだ技術を常に提供しているとの評価を得ている。

また、養成・向上訓練共に訓練生の訓練後の労働に対する取り組み姿勢が積極的である、新技術に対応・導入できるなどの評価があり、産業界からは、実技重視のナカワ職業訓練校の訓練内容が評価されている。

(4) 労働事情からのニーズ

ウガンダ国内の街や通りで営業している溶接、板金、自動車など各種自営ショップの独立方法を調査した結果、職がない人を中心に、学校を卒業した者、途中でドロップアウトした者等が、自営ショップ等に手伝いとして働き、指導を受けるのではなく、自分で見聞きしてその技術・技能を覚え、自分自身で資金をため、必要な機械等を購入して独立する方法が圧倒的に多い。しかしながら、このような方法で独立できない未就業者も少なくない。時には、自営している親から子へと技術・技能が伝承されることもあるという。

このような状況のなか、実技重視で産業界の評価が高いナカワ職業訓練校では、レベルの違いはあるものの、教育・スポーツ省で取り組み中の教育改革の一環となる、初等教育修了者に対する職業訓練の実施に関し、カリキュラム、シラバス作成のノウハウ付与や指導員養成研修の役割を担うなど、間接的ではあるが積極的に参画している。この点は、上述の未就業者も含め、ウガンダ国情に即した雇用確保等に重要な意義をもつものと考えられる。

第4章 評価結果

PCM手法の評価5項目に基づく評価結果は、以下のとおりである。

4 - 1 評価5項目による評価結果

内容は付属資料5、「評価用サマリー」参照。

4 - 1 - 1 妥当性

ウガンダ国では前述のとおり、1998年よりESIPに沿った教育政策が実施されており、それはMedium Term Budget Frameworkに反映されている。2000/2003年の優先政策とそれに伴う予算配分をみる限り、ナカワ職業訓練校レベルの訓練施設に対する予算の重点配分傾向はみられない（最近の状況では初等教育予算68%に対し、職業教育・訓練予算は3%。ほかは、中等教育13%、高等教育12%、その他4%）。現在、ウガンダ国の教育部門では、初等教育無料化政策に注力されている。初等教育無料化政策による初等教育は1997年に開始され、2003年に第1回生が卒業することになっている。重視されていくものとして、輩出される大量の初等教育修了レベルの人々に対する地域に根ざした技能訓練があげられている。教育・スポーツ省では、初等教育修了者を対象として約800か所の技能訓練機関「地域工芸学校（Community Polytechnics）」の展開を開始している。

1998年には、職業訓練が教育・スポーツ省所管に変更になった。これにより、当初の本プロジェクトの所管機関であったDITが労働社会福祉省から教育・スポーツ省へ移管された。教育・スポーツ省にはほかに職業教育・訓練を管轄するBTVETがあり、現在に至っても、DITの教育・スポーツ省内における位置づけ、DITとBTVETの関係等は検討中の状態となっており、ナカワ職業訓練校は、DITとBTVETの関係が不明確ななかで、双方の監督を受ける形になっている。今後のナカワ職業訓練校に対する教育・スポーツ省側の支援体制にもかかわってくることであり、状況の推移を引き続き注視していく必要がある。

また、教育・スポーツ省ではすべての分野（工業、農業、保健等）の教育を視野に入れ、カリキュラムなど教育基準の設定を進めていこうとしている。なお、ナカワ職業訓練校の校長は、今年度カリキュラムを検討する機関であるNational Curriculum Development CentreのSecondary Education Curriculum Review, Technical Committeeのメンバーになっており、ナカワ職業訓練校が重視する実技を多く反映させるカリキュラムを提言することが可能である。

一方、産業政策の点からみれば、2004年までの目標のなかに、製造業の増加等がうたわれている（観光通商産業省の2001/2002～2003/2004年の戦略目標によれば、重点施策は、「製造業の増加」、「中小企業の増加」、「技術援助と環境整備による中小企業の成長」等）。

ナカワ職業訓練校に対する企業等の評価は、養成訓練卒業生が即戦力になる、養成・向上訓練共に受講者が新技術に対応・導入できる、労働に対する取り組み姿勢が積極的であるなどであり、企業サイドからも実技重視のナカワ職業訓練校の訓練内容が評価されている。

また、人材育成分野は、我が国の対ウガンダ協力重点分野（基礎インフラ、人的資源開発、基礎生活支援及び農業開発）の1つとなっている。

したがって、本件に対する協力の妥当性としては、ウガンダ国の産業界のニーズ、日本の協力重点分野の観点からすれば高いといえるが、現行のウガンダ国の教育政策（職業訓練を含む）からみれば、必ずしも高いとはいえない。

上記のようなウガンダ国の教育分野における政策動向を見極め、ナカワ職業訓練校が、それにいかに貢献、関与できるかを考えながら活動を進めることが、今後ナカワ職業訓練校に対する我が国の協力を考えるうえで必要となっていくであろう。現在のウガンダ国における協力の緊急課題は、無償初等教育の卒業生に対する地域工芸学校を通じた職業訓練を、産業界、訓練生のニーズに合わせて調整することにある。ナカワ職業訓練校に対してもヒアリングが実施されており、将来的にはナカワ職業訓練校もこうした政策の動きに合わせて、活動を計画することが期待される。

なお、ドイツ技術協力公社（GTZ）は、水資源、インフラ、職業訓練の3分野に限定してウガンダに協力しており、職業訓練分野に関しては、1999年末より教育・スポーツ省に対し、Promotion of National Vocational Training System（NVTs）プロジェクトに関する政策支援を実施している。NVTsプロジェクトの目的は、職業訓練をウガンダ産業界と訓練生のニーズに合わせて改善していくことであり、政府、産業界、職業訓練機関、各ドナー間の対話を促進し、民間職業訓練校への経費支援を実施することも視野に入れている。GTZは過去ウガンダ国においてルゴゴ職業訓練校への協力をしてきたが（GTZの協力内容は後述）特定の訓練校に対する協力では協力対象となったところにしか裨益しないと考え、職業訓練政策全体のプログラミングに係る協力を行うことに方向転換したとの話であった。

4 - 1 - 2 有効性

養成訓練は各科とも高い応募率がみられ、ナカワ職業訓練校に対するニーズの高さを示している。

ナカワ職業訓練校では、調査時点で2回の卒業生を輩出したのみであり、卒業生の実績につき傾向を分析するのは時期尚早であるが、以下の事実が観察された。

第1回目、第2回目の卒業生のTrade Test（DITが実施）合格率はそれぞれ84.9%、78.5%であり、同種職業訓練校との比較では高い合格率となった。Trade Testは実技重視のテストであり、本テストの合格率の高さはナカワ職業訓練校のねらいである実技を身に付けることが実践

されてきたことを示している。なお、教育・スポーツ省の資格試験であるUNEBを第1回卒業生の45.8%が取得した。この合格率は他の公共職業訓練校と比較して遜色のない数字である。

また、第1回目、第2回目の卒業生の就職率はそれぞれ65.8%、50.9%である。第2回目の卒業生の就職率が低いのは、2001年7月に実施されたUNEBの結果がまだ発表されておらず、発表後に求職活動が行われるからであって、最終的には第1回目を上回る就職率となると予想されている。なお、通常、他の職業訓練校や技術大学では、学校側が学生の就職の斡旋まではしておらず、大学によっては斡旋手数料を徴収のうえ、企業への推薦を行っている状況とのことである。

向上訓練はウガンダ国の有力企業等（ナイルビール、カキラシュガー等）を対象に86コース実施され、その評価は聞き取り等による限り大変高いものであった。一例をあげると、ナイルビールはナカワ職業訓練校の向上訓練評価結果が非常に良かったことから、従来、南アフリカで実施していた訓練をナカワ職業訓練校に切り替えている。

現時点で物理的に出し得るアウトプットには限りがあり、今後も引き続きナカワ職業訓練校が産業界に評価される人材を輩出していくことが重要である。

4 - 1 - 3 効率性

協力開始当時の計画と比較すると、養成訓練については140%の達成率、向上訓練及び徒弟訓練については31%の達成率である（徒弟訓練についてはウガンダ国側DITの要請に基づいて行うことと中間評価段階において変更されており、要請がなかったため実施されなかった。なお、向上訓練は現在も企業ニーズ等に基づき実施、計画中であり、評価終了時には達成率が上昇することが見込まれている）。夜間訓練は当初計画になかったものの461名を対象に実施している（付属資料14.「訓練生数及び訓練時間数実績」参照）。

表 4 - 1 各訓練コースの達成率

コース	計 画	実績	特記事項
養成訓練(昼間)	12名 × 7 科 × 4 年 = 336名	465名	140%達成
向上訓練	12名 × 5 回 × 7 科 × 4 年 = 1,680名	523名	31%達成
徒弟訓練		なし	DITからの要請なし
養成訓練(夜間)	なし	461名	追加

日本側長期専門家の数は当初計画の10名からプロジェクト中期より7名に変更されている。

その他、効率性に影響を与えた状況として、3科（木工、電子、板金）の機材供与のタイミングが他の4科（電気、機械、溶接、自動車）に比して1年遅れ、養成訓練の開始もそれに伴い1年遅れの開始となったことがあげられる。

電子科、自動車科については、ウガンダ国における急速なニーズ変化（コンピューター、AT車等）に対応するためのコース改編に係る必要な技術移転が残されている。

ウガンダ側のカウンターパートの頻繁な交代が観察された。特に板金科と木工科において、もっとも頻繁であった。

GTZが協力したルゴゴ職業訓練校との比較は表4 - 2のとおりである（付属資料17.「ルゴゴ職業訓練校訓練生数推移」及び付属資料18.「ルゴゴ職業訓練校職員名簿」参照）。

表4 - 2 ルゴゴ職業訓練校との比較

項目	ナカワ職業訓練校	ルゴゴ職業訓練校
訓練科目	電子、電気、機械、自動車、木工、板金、溶接の7科	自動車、煉瓦、大工、電気、機械、塗装、配管、溶接の8科
長期専門家	7科7名（当初は10名）	8科5名
カウンターパート	カウンターパート 正職員 17名 校採用職員 33名 計 50名 管理要員 正職員 5名 校採用職員 27名 計 32名	カウンターパート 正職員 35名 校採用職員 27名 計 62名 管理要員 正職員 6名 校採用職員 9名 計 15名
政府補助	校採用職員給与は政府負担。	校採用職員給与は校負担。
訓練生数	7科計465名 1学年平均116名	8科計830名（1999年までの累計） 1学年平均118名
訓練生の出身	全国（90%以上がカンパラ外）	50%強がカンパラ出身
卒業生数	7科合計181名 （卒業率91.9%）	8科411名（1995～1998年卒業生の累計） 1学年平均103名（卒業率87.3%）
就職率	2回調査実施済み。 71.2%（2000年） 50.9%（2001年）	1996年に調査実施後、実施していない。
厚生施設	寮	寮なし

ルゴゴ職業訓練校の資料は1999年当時の資料であるが、ナカワ職業訓練校プロジェクトと比較し、投入、成果の面で大きい違いはなく、ナカワ職業訓練校プロジェクトは効率性の面ではルゴゴ職業訓練校プロジェクトと遜色ないと判断される。

当初計画と投入実績及び活動実績に関していえば、効率性はおおむね良好と判断される。

4 - 1 - 4 インパクト

養成訓練及び向上訓練により、実技重視で企業ニーズにあった人材を育成しているほか、外

部に及ぼした影響として、UNIDO、NGOとの連携による訓練を行ったこと、他の職業訓練施設の指導員に指導技法を付与したこと、実技重視のカリキュラムを他校に提供したことなどがあげられる。ナカワ職業訓練校の技術が先進的すぎるのではないかとこの当方の危惧に対して、UNIDO、NGOの評価は、地方のコミュニティの自営業者等に対するアドバイザーを育てることができる、実際に機械のメンテナンスができるようになるなど、肯定的なものであった。

連携の観点からいえば、各企業にナカワ職業訓練校の生徒の職場実習を引き受けてもらっているほか、UNIDOからナカワ職業訓練校の指導員に対して、中小企業、自営業者育成の必要性にかんがみ、ビジネスマネジメントの考え方を指導してもらい、それを養成訓練コースのカリキュラムに2002年から導入することが予定されている。

指導技法セミナーは、14回開催され（1999年2回、2000年5回、2001年7回）、他の職業訓練施設の指導員にも公開され、非常に好評であった。

向上訓練については、適切な施設が完備し、実技中心で実施されていることから評判が高く、マケレレ大学卒業生が実技習得のため、参加している事例も多くみられた。

特筆すべきことは、ジェンダーの観点から、ナカワ職業訓練校では養成訓練の各科5名までを女性の優先枠としていることである（ただし、女性の応募そのものが少ない科があることや、応募者へのインタビューを通じ、訓練生の関心事項を理解したうえで入学者を決定するため、必ずしもすべての科で女性が5名となっているわけではない）。

また、近隣に類似の公立職業訓練校（ルゴゴ職業訓練校）があり、そこでの訓練生の半数程度がカンパラ市内からの生徒であるが、ナカワ職業訓練校には寮が併設されていることから9割程度を地方出身者が占めており、現況ではナカワ職業訓練校への協力開始当初に想定されたとおりの役割分担（ナカワ職業訓練校はウガンダ全国をターゲットとする）ができていると考えられる。なお、全国から訓練生を募集するため、新聞やラジオを通じて募集を行うが、使用している新聞がケニア、タンザニア、ルワンダ等でも発行されているものであるため、現在ケニア、ルワンダからも訓練生が入校している。

以上のことはすべてプロジェクト実施による正のインパクトと評価できる。

4 - 1 - 5 自立発展性

財政的側面からみると、現在、ウガンダ国は国家予算の収支バランスを厳しく管理しており、教育・スポーツ省予算も30%カットされた状況である。なかでも、Poverty Action Fundに含まれないものは特に厳しい配賦状況となっている。また、予算の配賦はESIPが反映されることになっている。教育・スポーツ省からナカワ職業訓練校に配賦される予算は限られており、予算の配賦は当然ながらそのときどきの重点分野が勘案されている。したがって、ナカワ職業訓練校が確実に予算を獲得していくためには、ESIP等の政策を念頭に置いた活動を行っていくこと

も必要であろう。加えて、日本側のローカルコスト負担で賄われていた部分についても今後、ウガンダ国側の予算手当が必要となる。

人的側面からみると、カウンターパートの定着率は68%であるが、平均年齢は30歳代と比較的若く、今後長期的にナカワ職業訓練校で活躍してもらうことが期待される。

前述のとおり、ナカワ職業訓練校には国家公務員としての正職員とナカワ職業訓練校採用の職員がいる。ナカワ職業訓練校採用職員の場合、身分が不安定であり、民間に引き抜かれる可能性がある。一方、国家公務員の場合、人事異動の可能性は否めないものの、雇用条件が安定しており、カウンターパートの定着率を高めるためには国家公務員待遇への転換を進めることが望ましい(ただし、期待される成果をあげられないカウンターパートであっても簡単に解雇することができなくなるという一面もある)。現在、国家公務員待遇のカウンターパートはナカワ職業訓練校採用のカウンターパートより数が少ない。ただし、年々教育・スポーツ省は国家公務員待遇のカウンターパートを増やしており、2001年も10名増員予定であること、校採用の職員分の人件費も省から配賦するなど、ナカワ職業訓練校への人的配置につき、十分考慮していることがうかがえる。

技術的・物理的側面からみると、カウンターパートの入れ替えがあり技術移転が遅れている木工科(科長の任命は2000年4月、インストラクター2名の任命が2000年6月に行われたばかりである)、ウガンダ国における市場ニーズ・技術変化に伴うカリキュラム改編等を進める必要のある自動車科及び電子科への技術移転は、十分とはいえない状況である。

現有機材については、ほぼカウンターパートによる保守管理及び当該機材に係る訓練生への指導ができるようになっており、簡単な機器修理、パーツ製作は自校で実施している。一例をあげると、1969年に最初のプロジェクトで供給した機材のいくつかは、1997年に本プロジェクトが開始された時点でよく保守管理され、使用されていたという事実がある(一部修理されず、放置されていた機器もあり、日本人専門家により修理されたケースもある)。パーツ入手等をウガンダ国側独自で進めるときに参考となる製造・販売業者リストが未完成であり、プロジェクト終了までに仕上げる事となっている。

これらの点から自立発展性を勘案すると、財政面では教育・スポーツ省が引き続きナカワ職業訓練校を重視する意向はあるものの、国家予算の厳しい状況があるため、その動向を注視する必要があること、人的な面で離職や欠員の可能性は否めないが着実にウガンダ国側の努力が行われていること、技術面では一部日本からの今後のサポートが望まれることなどにより、現時点で「完全な」自立発展性があるとはいえなくても、ウガンダ国側の自立発展に向けた動きは見受けられるといえる。

4 - 1 - 6 阻害・貢献要因の総合的検証

(1) 阻害要因

本プロジェクトの最大の阻害要因は歳入不足である。ウガンダ国は、1986年に現ムセベニ大統領が就任以降、世銀・IMFの支援で「復興開発計画」を策定し、構造調整政策を実施しており、年率約7%の成長を達成している。また、ウガンダ国は、ケルンサミットでの合意に基づき「拡大HIPC（重債務貧困国）イニシアティブ」による債務削減措置が適用されることになっている〔開発援助委員会（Development Assistance Committee：DAC）・国連の分類では後発開発途上国・LLDCとなっている〕。現在は、農業部門を中心とした経済構造となっており、マクロ経済は安定しているものの、同国の経常収支、財政収支は赤字を続けており、政府予算執行の遅れ、政府職員への給与遅配が発生している。

ナカワ職業訓練校の運営費は、表4-3にあるように、政府予算、訓練費収入による校予算、インカムジェネレーション活動収入によるインカム予算に依拠している。なお、正職員の給与は、本表には含まれていない。

このうち、政府予算は、本来であれば毎月執行されるどころ、遅れがあり、特に1998年3月から12月まで10か月に及び執行されなかったことが、校運営に困難な状況をもたらした。この状況は現在も改善されておらず、2001年も1月、3月に予算執行が行われていない。また、別予算である公務員の給与遅配も恒常化しており、調査期間中も、3か月の遅配中であった。

表4-3 ナカワ職業訓練校の運営費（単位：1,000Uganda Shillings = ￥70）

年 度	1997/1998 1997.7～1998.6	1998/1999 1998.7～1999.6	1999/2000 1999.7～2000.6	2000/2001 2000.7～2001.6	合計	%
政府予算	180,991	276,188	423,657	266,585	1,147,421	71%
校予算	18,225	86,486	117,734	106,158	328,603	20%
インカム予算	0	25,719	52,054	62,918	140,691	9%
合 計	199,216	388,393	593,445	435,661	1,616,715	100%

注) ウガンダ会計年度（7月～6月）で区切り算出

(2) 貢献要因

1) 委員会活動（付属資料1、「ミニッツAnnex10」参照）

本プロジェクトでは当初より委員会方式による校運営を実施してきており、これが、ウガンダ国側のオーナーシップの醸成に役立ったと考える。また、校外活動で、給水塔へナカワ職業訓練校名を記入したり、新聞へ広告を掲載するような活動を共同で実施したこととは、日本側、ウガンダ国側の一体感を形成することにもつながったと思われる。

委員会は当初9委員会で運営していたが、現在は表4-4の6委員会となっている。

メンバーは副校長（議長）、科長、訓練マネージャー、会計、日本人専門家（委員）、校長、チーフアドバイザー（オブザーバー）となっている。

表 4 - 4 委員会活動

No.	委員会名
1	校運営委員会
2	訓練生管理委員会
3	安全衛生委員会
4	訓練機材委員会
5	訓練プロモーション委員会
6	校外活動委員会

当初は、月 1 回の開催で、委員長も専門家が務めていたが、現在はウガンダ国側に運営主導権が移っており、必要に応じて開催されている。

- 2) インカムジェネレーション活動（付属資料19.「インカムジェネレーション活動実績」及び付属資料20.「インカムジェネレーション活動顧客リスト」参照）

インカムジェネレーション活動は、政府予算執行の遅れに対応するため、1998年10月より実行された。2001年10月末現在までで、総収入は約 1 億5,223万U.Shs.（約1,066万円）となっている。

インカムジェネレーション活動は、校運営委員会で運営方法が規定されており、目的は以下の 3 点とされている。

- ・ 政府予算不足分の補填
- ・ 校運営費の補助
- ・ 各科職員の収入補填

収入は、材料費、消耗品費用を差し引いたあと、校と各科に等分される。校に配分された費用は、施設費、設備費、文房具等の消耗品、燃料費等に使われ、各科に配分された収入は各科消耗品の購入及び各科職員の収入補填となる。

主要な使途は表 4 - 5 のとおりである。

表 4 - 5 インカムジェネレーション活動の主要使途

費目	科配分	会議費	材料	文房具	燃料	消耗品	施設	手当	その他	計
%	53.7	12.0	9.0	6.9	4.3	3.9	3.3.	2.0	4.9	100.0

不正を防ぐため、インカムジェネレーション活動ルールは厳しく定められ、校長、委員会、会計等に報告されるほか、イントラネット上にデータベース化され、情報は関係

者に共有されている。

インカムジェネレーション活動は活発に実施されているが、あくまでも訓練の範囲内であり、訓練の妨げとならないことはもちろんのこと、訓練に有効と判断されるものを実施するよう調整されている。その収入は政府予算の不足、校運営費の不足をすべてカバーできるような金額ではないが、指導員の給与遅配の際の臨時支給にも有効に活用されている。

3) イン트라ネット

イントラネットの活用は2000年10月以降に開始され、情報の共有、コミュニケーションの円滑化に多大の貢献をしている。具体的には、教材、年間計画、訓練実施状況等の訓練管理に関する情報、及びインカムジェネレーション活動状況や支出入に関する経理関連データ等の情報の共有化を実現し、校全体の管理、運営の円滑化、健全化を促進する大きな役割を果たした。とりわけインカムジェネレーション活動情報の共有化は、収入の透明性の確保につながり、そのあと不正によるカウンターパートの交代を防ぐ力となったことは評価できる。また、他科の教材作成状況を閲覧できるようになり、各科の競争意識の高揚にも効果的であった。ナカワ職業訓練校のイントラネットの構造は図4-1のとおりとなっている。

ナカワ職業訓練校内イントラネットシステム

- ディレクトリー構造概要 -

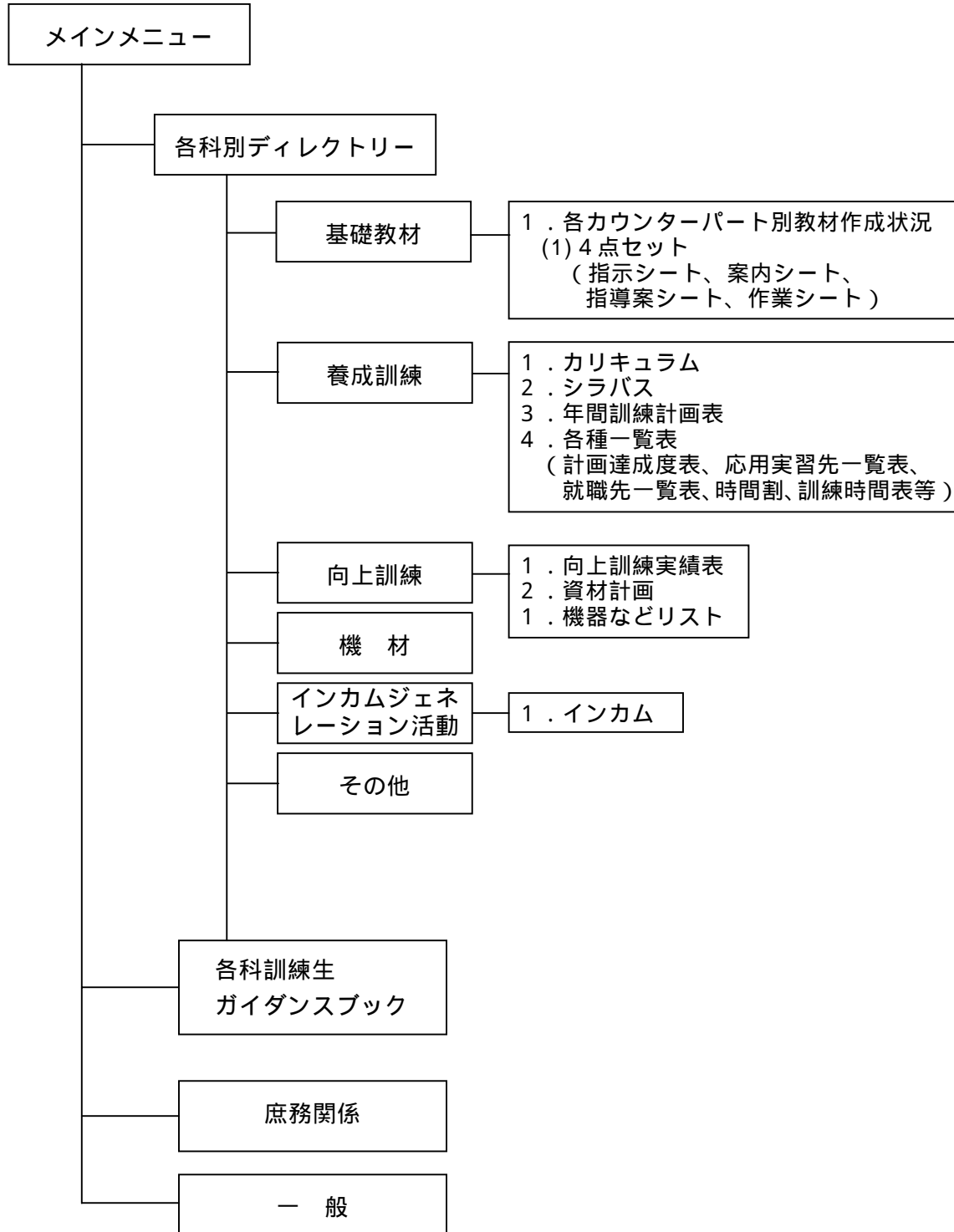


図 4 - 1 ナカワ職業訓練校内イントラネットシステム

4 - 2 結 論

総合的な観点から、本プロジェクトはウガンダ国政府と産業・工業界のニーズに効率的、かつ有効に貢献したと判断される。

したがって、いくつかの点を除いては、プロジェクト終了時にはPDMEに記載されたプロジェクト目標を達成するものと考えられる。

今回の調査を通じて、教育・スポーツ省をはじめとする関係者のほか、訓練生を雇用し、従業員の向上訓練を依頼する企業等が、ナカワ職業訓練校訓練生の有する技術力、勤労態度を、またかかる訓練生を輩出するナカワ職業訓練校を、大変高く評価していることがうかがわれた。

教育・スポーツ省次官は、ナカワ職業訓練校について今後Center of Excellence（職業訓練の中核となるようなイメージと考えられる）の役割を果たすことが期待され、予算、人員配置の面でも考慮していく旨の発言をしばしば行った。

類似の職業訓練校（ルゴゴ職業訓練校）に対する協力を行ったドイツのGTZは現在、職業教育・訓練政策策定への協力にシフトしている。今後職業訓練に対する協力を行っていく際には、ナカワ職業訓練校に対する高い期待と評価とともに、これらウガンダ国内の職業訓練政策をとりまく状況を十分考慮に入れ実施していく必要がある。妥当性の項で述べたように、現在ウガンダ国では職業訓練を含めた教育について基準等を含め、制度全体について検討中である。現行職業訓練政策に関していえば、初等教育を修了した人々に技能を習得させることを重視する方向が示されており、そのターゲットレベルはナカワ職業訓練校が直接ターゲットとしている訓練生のレベルとは異なっている。教育・スポーツ省の職業訓練に関する修正政策は、まだ草稿の段階であるが、ナカワ職業訓練校は、初等教育修了者対象の地域工芸学校（Community Polytechnics）プログラムへの貢献の可能性など、政府の政策をより一層考慮することが肝要である。

なお、JICAケニア事務所としては、ドイツの行っているような職業訓練全体計画にかかわる協力もよいが、むしろ日本は自国の得意分野である人材育成について、ナカワ職業訓練校のような現場をもちつつ政策に貢献していくような形での協力も重要であるとの考えである。

一方、1994年7月の事前調査団報告書に述べられているとおり、Oレベル資格者を訓練することに対する産業界のニーズは極めて大きいものがあるが、ナカワ職業訓練校を含めて公共職業訓練校が3校しかない現状では、今後もナカワ職業訓練校はこのニーズを充足するため、重要な役割を果たすことが期待されている。

技術的観点からみると、技術移転が遅れている木工科、ウガンダ国内における新しいニーズに対応するための改編を引き続き進めていくことが望ましい電子科、及び自動車科へのフォローアップとともに、多様なニーズにきめ細かく対応する必要のある各科向上訓練、その他専門的ないくつかの項目（配管、施行、非破壊検査など特定項目）について、引き続き効率を勘案しつつ協力をを行うことが望ましい。

第5章 提言と教訓

5 - 1 提言

ウガンダ国政府は、プロジェクト終了後もナカワ職業訓練校に対して適切な予算措置と人員配置を継続すべきである。

ナカワ職業訓練校は、機材を適正に維持するためにすべての可能な手段を講じるべきであり、保守管理費用を確保するための収支計画を策定する必要がある。日本側から供与されたすべての機材はナカワ職業訓練校の活動を維持するために使用されるべきものである。機材業者リストはプロジェクト終了時まで完成されること、また、スペアパーツについて、可能なものはケニアなど隣接国又は国内入手の可能性を検討する必要がある。

ナカワ職業訓練校は、政策検討、ニーズ調査、卒業生調査などを通じて社会や産業界のニーズに合致するよう継続して努力すべきである。

以下の分野に関して日本側による追加技術協力を提言した(付属資料22.「フォローアップ期間活動計画表(電子科、自動車科、木工科)」参照)。

(1) 電子科

情報技術に代表される新技術に関する産業界のニーズに対応するため、最近カリキュラムが変更されたことから、カウンターパートへの技術移転が十分には進んでいないため。

(2) 自動車科

電子燃料噴射式エンジンやオートマチックトランスミッションといった新技術に対する産業界のニーズから、最近カリキュラムが変更されたが、カウンターパートへの技術移転が十分進んでいないため。

(3) 木工科

カウンターパートの交替により技術移転が限られているため。

(4) 各科向上訓練

ウガンダ国内における新しい多様なニーズにきめ細かく対応する必要があるため。

(5) モーター制御技術等の特定技術

その他いくつかの科では特定の専門的な技術につき、引き続き協力が望まれるため。

なお、継続協力を行う場合には、ウガンダ国の教育政策にかんがみナカワ職業訓練校の貢献の可能性、当国の職業訓練に対する日本の協力のあり方等を考えていくことも、ナカワ職業訓練校への我が国の協力をより効果・効率的なものにするために重要なことと考える。

5 - 2 教訓

次の各点を教訓としてあげたい。

- (1) 共通科目の実施にあたっては効果的運営のために各科横断的な話し合いが重要である。全科のクラフトマン教育に必要な基礎学力、専門基礎等を各科で協議し、統一の見解の下に委員会制度を活用し、シラバス、カリキュラム、年間訓練計画表に反映するなど、校運営、訓練管理全体を実施していく必要がある。
- (2) 予算が不足する場合には、訓練に役立つ範囲でのインカムジェネレーション活動が有効となり得る（インカム収入を給与の遅配が続いた場合の臨時給与として支給することで、他校のようにストライキを招くような事態を防ぐことができるなど）。
- (3) 機材供与の遅れなど、投入の遅れが予想される場合には、個々の活動の時期を見直すことが効果・効率の面から重要である。
- (4) 委員会方式による校運営は各科の意見を反映させた問題解決に有効な手段である。
- (5) イン트라ネットによる情報共有化は、関係者の円滑なコミュニケーションとインカムジェネレーション活動の透明性確保に有効である。また、今後のJICA職業訓練プロジェクトの地域間、各国間における訓練カリキュラム、教材、訓練計画等の情報共有化への進展、訓練全体の運営管理等に有効である。

付 属 資 料

- 1 . ミニッツ
- 2 . PDME
- 3 . PDMの変遷
- 4 . 評価グリッド (調査結果表)
- 5 . 評価用サマリー
- 6 . カウンターパート配置実績表
- 7 . 校運営費収支状況表
- 8 . 専門家派遣実績
- 9 . カウンターパート研修受入実績
- 10 . 主な供与機材管理及び技術移転状況
- 11 . 各科訓練概要
- 12 . 訓練生数及び訓練時間数実績
- 13 . シラバス (機械科分)
- 14 . 新旧カリキュラム対照表 (電子科、自動車科)
- 15 . 技術移転達成表
- 16 . 教材作成状況一覧表
- 17 . ルゴゴ職業訓練校訓練生数推移
- 18 . ルゴゴ職業訓練校職員名簿 (1998年10月)
- 19 . インカムジェネレーション活動実績
- 20 . インカムジェネレーション活動顧客リスト
- 21 . プロジェクト経緯表
- 22 . フォローアップ期間活動計画表 (電子科、自動車科、木工科)

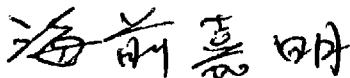
MINUTES OF MEETING
BETWEEN
THE JAPANESE EVALUATION TEAM
AND
THE AUTHORITIES CONCERNED OF THE GOVERNMENT OF
THE REPUBLIC OF UGANDA
ON
JAPANESE TECHNICAL COOPERATION
FOR
THE NAKAWA VOCATIONAL TRAINING INSTITUTE PROJECT

The Japanese Evaluation Team (hereinafter referred to as “the Japanese Team”), organized by the Japan International Cooperation Agency (hereinafter referred to as “JICA”) and headed by Mr. Yoshiaki Umimae, visited the Republic of Uganda from October 30 to November 8, 2001.

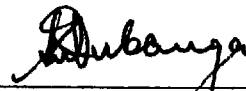
During its stay in the Republic of Uganda, the Japanese Team had a series of discussions with the Ugandan authorities concerned and jointly evaluated the present achievements of the Nakawa Vocational Training Institute Project (hereinafter referred to as “the Project”) and exchanged views on the project activities to fulfill the Record of Discussions signed on March 5, 1997.

As a result of the discussions, the Japanese Team and the Ugandan authorities concerned agreed to report to their respective Governments the matters referred to in the document attached hereto.

Kampala, November 6, 2001



Mr. Yoshiaki Umimae
Leader
Japanese Evaluation Team
Japan International Cooperation Agency
Japan



Mr. Francis X Lubanga
Permanent Secretary
Ministry of Education & Sports
Republic of Uganda

THE ATTACHED DOCUMENT

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1. INTRODUCTION

1-1. Preface

The Project was initiated in May 1997 and will be completed by May 2002. The Japanese Team dispatched by JICA visited the Republic of Uganda from October 30 to November 8, 2001 for the purpose of evaluating the achievements of the Project. The evaluation has been undertaken jointly by the Ugandan authorities concerned and the Japanese Team.

1-2. Objectives of Evaluation

Objectives of the evaluation are as below.

- 1) To grasp the Inputs of Ugandan and Japanese sides to the Project and summarize the achievements of the Implementation Plan of the Project.
- 2) To execute a comprehensive evaluation on the achievements of the Project from the viewpoint of five components of evaluation (explained later in this document).
- 3) To make a recommendation to the future perspective of the Project and draw lessons learnt from the Project for the same field of technical cooperation.

1-3. Schedule of the Japanese Evaluation Team

(October 30 – November 8, 2001)

<u>Date</u>	<u>Schedule</u>
Oct. 30	Arrival at Kampala Courtesy Call to the Embassy of Japan, Meeting with Japanese experts
Oct. 31	Courtesy Call to the Ministry of Education & Sports, the Ministry of Foreign Affairs, German Technical Cooperation (GTZ) and the Directorate of Industrial Training (DIT)
Nov. 1	Courtesy Call to the Ministry of Finance, Planning and Economic Development, Discussion with the Ministry of Education & Sports Explanation of the evaluation, Interview with Ugandan counterpart personnel, trainees and Japanese experts
Nov. 2	Interview with Ugandan counterpart personnel, trainees and Japanese experts
Nov.3-4	Team Meeting, Interview with Ugandan counterpart personnel and Japanese experts
Nov. 5	Evaluation Meeting with the leaders of local companies and organizations.
Nov. 6	Discussion about the Minutes, Signing the Minutes
Nov. 7	Report to the Embassy of Japan
Nov. 8	Departure from Kampala



1-4. Evaluators/Attendants

1-4-1. Evaluators/The Japanese Side

Mr. Yoshiaki Umimae	Leader
Mr. Michihiro Wakamatsu	Training Management
Mr. Masaju Maruyama	Training Management
Ms. Mitsuko Kumagai	Project Management
Ms. Aya Omura	Cooperation Planning
Mr. Hiroshi Watanabe	Project Analysis

1-4-2. Evaluators/The Ugandan Side

Mr. Francis X Lubanga	Permanent Secretary, Ministry of Education & Sports
Mr. Pius Bigirimana	Under Secretary, Ministry of Education & Sports
Ms. Doreen S. Katusiime	Principal Assistant Secretary, Ministry of Education & Sports
Ms. Florence. M. Maringa	Commissioner Education Planning, Education Planning Department, Ministry of Education & Sports
Mr. Okinyal Henry	Acting Commissioner, Department of Business/Technical/Vocational/Education & Training, Ministry of Education & Sports
Mr. Kaaya Kizito	Commissioner, Directorate of Industrial Training
Mr. Abasi Tuzinde	Principal, Nakawa Vocational Training Institute
Mr. Masolo Sam Jasper	Acting Deputy Principal, Nakawa Vocational Training Institute

1-4-3. Attendants

Embassy of Japan:

Mr. Hajime Iwama	Second Secretary
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JICA Kenya Office:

Mr. Shinichi Matsuura	Deputy Resident Representative
Mr. Hiroshi Kawanobe	Assistant Resident Representative
Mr. Japhet M. Sabai	Program Office

Japan Overseas Cooperation Volunteers (JOCV), JICA:

Mr. Tomoaki Tsugawa	Co-ordinator
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Project Team:

Mr. Hiroshi Sakamoto	Chief Technical Advisor
Mr. Susumu Makino	Coordinator
Mr. Kazuaki Sato	Long-term Expert (electronics & electricity)
Mr. Yukio Nozawa	Long-term Expert (machinery)
Mr. Toshio Takeno	Long-term Expert (motor vehicle)
Mr. Toshihiko Yamakawa	Long-term Expert (woodworking)
Mr. Tetsu Goto	Long-term Expert (welding)

Nakawa Vocational Training Institute:

Mr. Olowo Silver	H.O.S. of motor vehicle section
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1-5. Methodology of evaluation

The evaluation study was conducted in accordance with the JPCM (Japan Project Cycle Management) method in the following steps:

- 1) The Project Design Matrix (hereinafter referred to as "PDM") for final evaluation (hereinafter referred to as "PDMe") in Annex 1 was agreed by both sides on the basis of the evaluation.
- 2) Achievement of the Project was studied by collecting data and other relevant information.
- 3) Analysis was made for five evaluation criterion described below.
 - (1) Efficiency
Efficiency of the Project implementation is analyzed with emphasis on the relationship between outputs and inputs in terms of timing, quality and quantity.
 - (2) Effectiveness
Effectiveness is assessed by evaluating to what extent the Project has achieved its purpose and clarifying the relationship between that purpose and outputs.
 - (3) Impact
Impact of the Project is assessed by either positive or negative influence caused by the Project.
 - (4) Relevance
Relevance of the Project is reviewed by the validity of the Project purpose and the overall goal in connection with the development policy of the Government of Uganda and needs of the beneficiaries and also by the logic of the Project plans.
 - (5) Sustainability
Sustainability of the Project is assessed in terms of organizational, financial and technical aspects by examining the extent to which the achievements of the Project are sustained or expanded after the Project is completed.
- 4) Finally, the evaluators reached an agreement on the conclusion of the evaluation and made recommendations.
- 5) For evaluation, the materials used are the followings: the R/D, the series of PDMs, the Plan of Operation (PO) in Annex 2, a series of minutes of discussions held during the Project term, the reports made by the Project and the results of meetings, interviews and observations made by the Japanese Team during its stay in Uganda.

2. BACKGROUD AND SUMMARY OF THE PROJECT

2-1. Background of the Project

The Nakawa Vocational Training Institute (hereinafter referred to as "Nakawa VTI") was established through a project implemented under Japan's project-type technical cooperation scheme (project period: June 1968 to June 1974). It serves as a facility for improving the skills needed by technical personnel to support small & medium sized enterprises in the country and Uganda had operated the Institute on its own since the end of



Japanese cooperation.

Since 1986, Uganda has been working to develop its industries based on its reconstruction, therefore development program and shortage of skilled workers are urgently demanded. This had made it necessary to expand the role of the Nakawa VTI to go beyond the traditional area of focus (e.g., training of currently employed workers) to include training of unskilled young people.

Based on this, in May 1994 the government of Uganda made a request to Japan for implementation of another project-type technical cooperation directed at the Institute. In response to the requests, the Japanese government conducted a preliminary study and a long-term study. Using the results of these studies, Japan dispatched an implementation consultation study team to Uganda in February 1997, and in May of the same year it commenced a five-year project. This project aims to enhance the skills of instructors in seven sections (electricity, electronics, machinery, motor vehicle, welding, sheet metal, and woodworking) and to provide guidance and advice in the establishment and appropriate operation of basic, upgrading and apprenticeship training courses.

2-2. Summary of the Project

The Project has been implemented based on PDMo and it has been revised once since the Project started. The original PDMo was reviewed by the Japanese Consultation Team sent by JICA and Ugandan authorities concerned of the Project and revised in Jan. 2000, which is called PDM1.

The major modifications of PDMs are described as follows:

- 1) OUTPUT 3 was revised to identify the evening class as a part of project activities and to clarify the apprenticeship training is implemented upon the request by Directorate of Industrial Training (hereinafter referred to as "DIT").
- 2) Three activities, such as 1-2, 1-3, 1-4, were added to clarify the income generating activity and the committee activity as the part of project activities.
- 3) In IMPORTANT ASSUMPTION, the Ministry in charge was revised from the "Ministry of Labour and Social Welfare" to "the Ministry of Education & Sports" as the project was transferred from Ministry of Labour and Social Welfare (hereinafter referred to as "MLSW") to Ministry of Education & Sports (hereinafter referred to as "MOE&S") due to the restructuring of the civil service of the government of Uganda.
- 4) The target groups were specified as the Counterpart personnel and the trainees of Nakawa VTI.

The PDMe is shown in Annex 1.

2-3. Plan of Operation (PO) for the Whole Period

PO is shown in Annex 2 and it has been revised according to the progress of the project every year, and is being implemented currently.



3. EVALUATION

3-1. Achievements of the Plan

The details of the achievements are shown in Annex 4 to 10.

3-2. Results of the evaluation

The followings are summaries of the results of the evaluations. For details, please refer to Annex 11.

3-2-1. Efficiency

Japanese long-term experts in electronics, woodworking and sheet metal were dispatched on schedule, but the equipment was arrived behind schedule. (Refer to Annex 3.1)

Frequent replacements of counterparts were observed especially in sheet metal and woodworking sections. (Refer to Annex 3.4)

Due to the change of technology, delay of new technology transfer was observed in electronics and motor vehicle sections.

As a result, the delay of technology transfer in these 3 sections mentioned above was observed partially.

The present number of trainee in each section is around 20 while the planned number in the Record of Discussion was 12 for each 7 sections (The number of trainee in each section was revised in January 2000). The planned number of upgrading training was 12 and 5 courses (including apprenticeship training) for each of 7 sections while performance number of trainee of upgrading training is as per the table below. The apprenticeship training was not implemented because there was no request from DIT (The apprenticeship training was revised in January 2000, to be implemented upon the request by DIT). In addition, evening course of the basic training was implemented and the performance is as per the table below, the original plan did not include evening course. (Refer to Annex 4)

Course	Plan	Performance	Remarks
Basic Training (daytime)	12 persons×7 sections×4 years = 336 persons	465 persons	Achieved 140%
Upgrading Training	12 persons×5 times×7 sections ×4 years = 1,680 persons	523 persons	31%
Apprenticeship training		nil	No request by DIT
Basic Training (evening)	N.A.	461 persons	Addition

Comparing with the original output and the similar project in Uganda, the efficiency of the Project is fair.



3-2-2. Effectiveness

High applicant/enrollment ratio proved the high demand for Nakawa VTI. (Refer to [Annex 6.1](#))

Since Nakawa VTI had graduates only twice in March 2000 and 2001 respectively, it is too early to evaluate the tendency of graduates performance. However, from the two batches of graduates, following facts were observed.

The 84.9 % of March 2000 graduates and 78.5% of March 2001 graduates of Nakawa VTI passed the Trade Test. The Trade Test results of Nakawa VTI were better than the other institutions and that shows the graduates of Nakawa VTI are outstanding in their skills, as the Trade Test puts emphasis on practical skills. The 45.8% of March 2000 graduates passed the examinations of the Uganda National Examination Board (UNEB). The result of the UNEB of Nakawa VTI is almost same as the one of Lugogo Vocational Training Institute (hereinafter referred to as "Lugogo VTI") and better than the one of Jinja Vocational Training Institute. (Refer to [Annex 6.2](#))

The 71.2% of March 2000 graduates and 50.9% of March 2001 graduates were employed. (Refer to the [Annex 6.3](#))

The upgrading training was conducted for the Ugandan leading companies, such as Nile Breweries Ltd., Kakira Sugar Co., Ltd. etc.. As an example, Nile Breweries Ltd. requested the third party assessment of the upgrading training in Nakawa VTI and the result shows it is efficient. Although Nile Breweries Ltd. used to conduct their training in South Africa, they can now request Nakawa VTI to conduct their training. (Refer to the [Annex 7](#))

3-2-3. Impact

In addition to the direct outputs and achievements of the Project, positive impact is observed. Joint training was requested by UNIDO and NGOs because the reputation of Nakawa VTI was very good. As for the joint training with UNIDO, the upgrading training at Nakawa VTI was found very practical and effective. In return for that, UNIDO gave the business management training to the counterpart personnel of Nakawa VTI and its output is to be reflected to improve the curriculum of Nakawa VTI. Trainer's training seminars were held 14 times (1999; 2 times, 2000; 5 times, 2001; 7 times). External trainers were also invited and the reputations were very good. (Refer to [Annex 8](#)) Even the Makerere University graduates joined the upgrading training in Nakawa VTI because the course is practice-oriented and equipped with relevant facilities.

At least 5 women trainees are given the priority to enroll in each section. This fact is remarkable from the viewpoint of gender issues.

Both Nakawa VTI and Lugogo VTI are located in Kampala. In Nakawa VTI, more than 90 percent of the trainees are from the local districts other than Kampala, while Lugogo VTI recruits about 50 percent of trainees from Kampala. Therefore, the two institutions can be discriminated in terms of the aspects aforementioned.

3-2-4. Relevance

The position of DIT, which supervises 4 government vocational training institutions including Nakawa VTI, is under consideration in the MOE&S since DIT was transferred from the MLSW in 1998 through the restructuring of the civil service. (Refer to



Annex 12.2)

Government of Uganda enforces the education policy in line with the Education Strategic Investment Plan (ESIP) since 1998, and the priorities 2000/2003 are identified as “defining national aims and objectives for pre-primary education and re-defining those of primary education”, “redefining the aims and objectives of secondary education to bring them in line with the broad aim of education and prevailing national aspirations”, “the establishment of a National Council for Higher Education to define and ensure implementation of appropriate functions of higher education”, “structural and curricular changes leading to integration of technical and business education to make vocational more attractive and relevant to market needs, and to provide greater avenues for career advancement”, and so on.

Medium Term Budget Framework is guided by ESIP, recent educational budget shares are: Primary 68%, Secondary 13%, Business, Technical Vocational Education and Training 3%, Tertiary 12%, Others 4% respectively.

The government of Uganda introduced the universal primary education program, which is the tuition free primary education (UPE) in 1997 and first graduates will come out in 2003. MOE&S promotes the vocational training for the post-primary education and has started the establishment of around 800 community polytechnics.

In addition to the above, the strategic objectives of the Ministry of Tourism, Trade and Industry 2001/2002-2003/2004 shows the importance “to increase the share of Manufacturing Values Added in GDP”, “to increase value addition of small-scale industries”, “to promote the growth of Small and Medium Scale Industries by providing an enabling environment and Technical Assistance in order to increase their contribution to GDP”. And the evaluation by industrial sector is as follows;

- 1) The trainee of Nakawa VTI is skilled enough to play an active role at companies soon after the recruitment. At technical point of view, sometimes their skill is more highly appreciated than that of the graduates from Makerere University.
- 2) Trainee of Nakawa VTI keeps up with and also keen to introduce new technology corresponding to industrial needs.
- 3) Attitude toward work of the trainee of Nakawa VTI is very positive. Also, it is said that even after taking a short period of upgrading course, the attitude of the employees has been improved.

Human resource development is one of the important issues of Japanese official development assistance to Uganda. Therefore, if Nakawa VTI makes necessary effort in order to contribute to the effective modification of curricula of vocational and technical education or post-primary community polytechnics, etc., the relevance of Japanese assistance to Nakawa VTI will not be low.

3-2-5. Sustainability

As the result of the close monitoring of the Ugandan budget, the total government budget expenditure was reduced. The budget for the educational sector was cut by 30% for the year 2001/2002, and the sub-sectoral share of the Department of Business, Technical, Vocational Education and Training (hereinafter referred to as “BTVET”) is also reduced. The non-Poverty Action Fund (PAF) development programs were affected more



severly.

At Nakawa VTI, the income generating activities are being implemented as a supplement of the budget deficit, but the activities are very limited as for the means to make up the deficit. Besides, after the termination of the Japanese cooperation period, the local cost covered by Japanese side such as publicity, seminar expenses etc., even though the portion is not large and the share of the Ugandan side is gradually increased, should be totally supplied by the government of Uganda. On the other hand, the Ugandan educational budget would be guided by ESIP. Therefore, to secure the sustainability of the financial aspect, the sufficient budget should be approved and allocated for Nakawa VTI by the government of Uganda. Nakawa VTI itself should make continuous effort to meet the socio-economic development in order to ensure the governmental budget.

The number of the full-time counterpart personnel (the government officer) recruited by MOE&S was 7 by 1999, and 9 was recruited in 2000 and 10 is scheduled to be recruited in 2001. The balance is all part-time counterpart personnel (hired by Nakawa VTI funded by the Ugandan government).

Present situation for allocation of full-time counterpart personnel / part-time counterpart personnel is as follows; management 4/1, electronics 1/5, electricity 1/5, machinery 2/3, motor vehicle 2/6, woodworking 4/3, sheet metal 2/5, welding 1/5. In order to secure the sustainability of the personnel aspect, it is desirable to increase the ratio of the full-time counterpart personnel.

Only 68 % among the counterpart personnel assigned has remained in Nakawa VTI. However, the average age of the counterpart personnel is still in their early thirties. Therefore, they are expected to stay for long years from now.

The H.O.S of the woodworking section was appointed in April and two instructors in June 2000 respectively, which contributed to the limitation technology transfer. (Refer to Annex 3.4)

The instructors in the electronics and motor vehicle sections have good ability to conduct the training course, but it is desirable to obtain the new technology, for example, the information technology, the automatic transmission and the electric fuel injection engine as the technology of these sections is remarkably advancing according to the market needs in Uganda.

The maintenance of almost all the equipment can be done properly in Nakawa VTI. (Refer to Annex 3.3) The minor repair of the equipment, including making some spare parts ~~could be managed by the counterpart personnel in some sections of Nakawa VTI.~~ For instance, in 1967 when the Project started, several equipment ~~instated~~ in the period of first project in 1969 was well maintained and operational. However, some cases were observed that equipment was left un-repaired.

The vendor list of the spare parts for newly introduced equipment is under preparation and is expected to be completed by the end of the Project.

4. CONCLUSION AND RECOMMENDATIONS

4-1. Conclusion of the evaluation

Both sides conclude that the Project has efficiently and effectively contributed to the needs of the government of Uganda and the industrial sector.

Therefore, both sides mutually agreed that the Project can accomplish the Project Purpose in the PDMe by the end of the cooperation period except for some sections.

The revised policy of vocational training by MOE&S is still in the draft stage. The activities of Nakawa VTI should be continued to consider the government policy, for example, the possibility of the contribution to the community based polytechnics program in the post-primary education.

On the other hand, as mentioned at the preparatory study stage of the Project in July 1994, there were tremendous needs to train the "O" level holders or above to meet the demand of the industrial sector. And there are only three institutions including Nakawa VTI run by the government for this purpose. Therefore, Nakawa VTI still plays the important role in order to fulfill the requirement.

From the technical viewpoint, the necessity of the continuous cooperation of Japan was observed in the field of the woodworking, where the replacements of counterpart personnel made the technology transfer delay and the electronics and motor vehicle sections, where the curriculum of the new technology was revised recently to cope with the market demand change.

4-2. Recommendations

For the sustainable development of Nakawa VTI, the Japanese side and the Ugandan side shared the common view that matters described hereinafter should be considered by both sides.

4-2-1. Allocation of sufficient budget and personnel

Both sides agreed that the Ugandan government should continue to allocate appropriate budget and personnel to Nakawa VTI even after the completion of the Project.

4-2-2. Maintenance/Management of training equipment

Nakawa VTI should always take all possible measures to maintain its equipment in proper condition and should make an income and expenditure plan in order to secure the maintenance cost. All equipment, which was donated from Japan for the Project, should be utilized exclusively for Nakawa VTI activities to sustain its function.

Spare parts vendor list should be completed by the end of the Project.

4-2-3. Policy study, needs survey and graduates trace

Nakawa VTI should continue its effort to meet the social and industrial needs by conducting policy study, needs survey, graduates trace study and so forth.

4-2-4. Consideration of Japanese assistance

Further technical assistance from Japanese side in the fields of 1) Electronics,



2)Motor Vehicle, 3)Woodworking, 4)Establishment of upgrading courses, 5) Specific fields in other sections, for example motor control technology would be helpful to ensure the technology transfer to Nakawa VTI.

The reasons are as follows;

- 1) The curriculum was revised recently as per the market demand change for the new technology, such as the information technology, and the technology is not yet fully transferred to the counterpart personnel in the electronics section.
- 2) The curriculum was revised recently as per the market demand change for the new technology, such as the automatic transmission and the electrical fuel injection engine, and the technology is not yet fully transferred to the counterpart personnel in the motor vehicle section.
- 3) The replacements of the counterpart personnel limited the technology transfer in the woodworking section.
- 4) Nakawa VTI should cope with the various technological demands by industrial sector.
- 5) Some specific topics in the other sections were raised for the further technical assistance.

Since the policy of educational sector on vocational training as well as the curricula are now under discussion, it is very important for Nakawa VTI to carry out the activities in line with the said policy. That will determine whether Nakawa VTI can secure the government budget or not.

4-3. Lessons learnt

- 1) At implementing common subjects, more discussions and frequent exchange of the opinions beyond sections should be done for the effective operation.
- 2) The income generating activities could be effective in case of shortage of the budget allocation to the project so far as it is useful to the training and conducted as the part of the training.
- 3) The delay of equipment supply may cause the delay of technology transfer, implementation of the courses as well as influence the efficiency of the project. In case delay of each input is forecasted, the timing of each activity inputs should be adjusted.
- 4) The committee activities among all sections are effective method to solve the problems reflecting the opinions of all sections concerned.
- 5) The intranet system and data base system are useful for smooth communication among the personnel concerned and for ensuring the transparency of the income generating activities.

(Concluded)



PDM for evaluation (PDMe)

Project : Nakawa Vocational Training Institute Project, Uganda

Duration : 20 May 1997 - 19 May 2002

Location : Kampala, Uganda

Target Group : Counterpart personnel and Trainees of NVTI

Author : JICA evaluation mission

Date : 6 November 2001

Narrative Summary	Verifiable Indicators	Means of Verification	Important Assumption
Overall Goal Demands for skilled craftsmen/women needed by industries are satisfied.	Employment by industrial sectors	Manpower survey	
Project purpose Skilled craftsmen/women needed by industries is fostered through the basic, upgrading and apprenticeship training courses in the seven fields (machining, electricity, welding, sheet metal, motor vehicle, electronics, carpentry).	1.a Number of applicants to the Institute. 1.b Trainees' performance 1.c Competency of graduates of the Institute 1.d Number of graduates of the Institute 1.e Level of graduate employment	1.a Data of the Institute 1.b Continuous assessment and examination in the Institute 1.c Assessment and certification by DIT 1.d Data of the Institute 1.e Tracer study	- Ministry of Education and Sports continues the policy to strengthen vocational training - Finance for continued support of this project - Industrial sector can employ the number of trainees that will be trained
Output 1. Necessary facilities, equipment and personnel are set up in the seven fields 2. The ability of Ugandan counterparts in the seven fields is upgraded. 3. The contents of the basic (daytime and evening class) and upgrading seven fields are fixed and training is implemented properly. Apprenticeship training is implemented properly upon the request by DIT.	1.a Number of counterpart personnel and administrative personnel 1.b Installation of equipment 1.c Utilization of equipment 2. Ability of counterparts to use the equipment for delivering the curriculum 3. Performance of training course implementation	1.a Data of the Institute 1.b Project report 1.c Operation record of equipment 2. Achievement check list of instructors by the Japanese experts 3. Project report	- There is a sufficient number of trainees, especially in basic training course to guarantee the operation cost of the Institute - Curriculum that is relevant to the needs of industry
Activities 1-1 To secure Ugandan counterpart personnel necessary for implementing vocational training 1-2 To establish the management system of the Institute 1-3 To implement the income generation activities 1-4 To run the Institute by the Committees 1-5 To select and install machinery and equipment for vocational training properly 1-6 To maintain machinery and equipment for vocational training properly. 2-1 To evaluate and to upgrade the level of teaching methods in the seven fields 2-2 To introduce practice by utilizing machinery and equipment 2-3 To make teaching and learning material for vocational training 3-1 To investigate the needs of industries and to decide the contents of training courses 3-2 To develop and revise curricula and syllabi 3-3 To make and select teaching and learning materials for vocational training 3-4 To recruit trainees 3-5 To select companies suitable for industrial attachment 3-6 To conduct training course evaluation	Inputs Uganda side 1 The land for the Institute 2 Assignment of Ugandan full-time counterpart personnel 3 Assignment of administrative personnel 4 Expenses necessary for the implementation of the Project	Japanese side 1 Dispatch of long-term experts 2 Short-term experts, when necessary 3 Training of Ugandan counterpart personnel in Japan 4 Provision of equipment	- the Ugandan counterparts remain in the Institute Pre-condition The Ugandan Government provides financial support for the Institute - Employment of necessary number of counterparts and other staff

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Plan of Operation (PO) for the Whole Period

Activities	Target	Schedule(Fiscal Year)																								Responsible Person in Project Team	Input	Remarks
		1997				1998				1999				2000				2001				2002						
		I	II	III	IV	I	II	III	IV	I	II	III	IV	I	II	III	IV	I	II	III	IV	I	II	III	IV			
1-1. To secure Ugandan counterpart personnel necessary for implementing vocational training.	Placement of C/Ps, and managerial staff	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	Chief Technical Advisor Principal	Chief Technical Advisor	Replacement of C/Ps needs special attention, as there can be vacancies created by transfer, etc. of C/Ps.
1-2. To establish management system of the Institute	Management control of training facility.	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Expert in each section	To strengthen the system that there is no hindrance in the income generation activity.
1-3. To implement the income generation activities.	Procurement of fund for training management.	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Instructor in each section	
1-4. To run the Institute by the Committees.	Activity of 8 Committees	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Managerial staff 6 committees	
1-5. To select and install machinery and equipment suitable for vocational training.	Grant aid materials	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Necessary materials	
1-6. To maintain machinery and equipment for vocational training properly.	Introduction of maintenance management system	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■			
2-1. To evaluate and to upgrade the level of teaching methods in the seven fields.	Instruction on both practical skill and theoretical knowledge	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	Chief Technical Advisor, Principal	Chief Technical Advisor, Expert in each section	To instruct the effective use of computers in order to store and improve in the production of teaching materials.
2-2. To introduce practice by utilizing machinery and equipment.	Technical transfer to C/Ps	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Principal	
2-3. To make teaching and learning materials for vocational training.	Establishment of 4-training-set	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Instructor in each section Managerial staff	
3-1. To investigate the needs of industries and to decide the contents of training courses.	Management, establishment of Industrial Committee. Visiting industries.	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	Chief Technical Advisor, Principal	Chief Technical Advisor	To research the local technical level accordingly and adjust the content and standard of training to meet the needs.
3-2. To develop and revise curricula and syllabi.	Establishment of curricula, syllabi.	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Expert in each section Principal	
3-3. To make and select teaching and learning materials for vocational training.	Intensification of audio visual teaching materials (Including establishing reference books and literature)	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Instructor in each section Managerial staff	
3-4. To recruit trainees.	Publicity by mass media Establishment of items of recruitment, selection manual	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Managerial staff	
3-5. To select companies suitable for industrial attachment.	Procurement of appropriate industrial attachment. (Visiting industries)	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■		Necessary materials	
3-6. To conduct training course evaluation.	Evaluation by trainees and employers (Survey by questionnaires)	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■			

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ANNEX 3.2

Counterpart Personnel Training

Field	Training subject	Type	Place of training	Name of trainee	Period of training	M/M
Managerial section	Seminar for training management	Group	HITC	A.Tuzinde	95.08 - 95.10	3.0
	(Instructor) Production machinery	Group	Polytechnic University for Ability Development	A.Masolo	95.04 - 95.12	9.0
	Metal processing skill	3rd country, individual	Egypt CMRDI	A.Masolo	97.09 - 97.11	3.0
	Seminar for training management	C/P	Overseas Vocational Training Association	A.Masolo	99.06 - 99.08	3.0
	Seminar for Vocational Training Management	Group	Hachioji International Training Center	G.Mwesigye	00.06 - 00.08	2.0
	(Instructor) Electronics technology	Group	Polytechnic University for Ability Development	G.Mwesigye	96.04 - 96.12	9.0
	(Instructor) Electronics technology	Group	Polytechnic University for Ability Development	V.Awaryi	98.04 - 98.12	9.0
	Human Resources Development	C/P	Ministry of Labour etc.	Francis X. Lubanga	99.10 - 99.10	0.5
Electronics section	Applied electricity engineering	3rd country, group	Kenya JKUAT	F.Ornoo	99.02 - 99.03	2.0
	Electronics engineering	C/P	Polytechnic University for Ability Development	F.Ornoo	99.04 - 99.12	9.0
	Electronics engineering	C/P	Chiba Polytechnic	H.Kagezi	98.10 - 99.03	6.0
	Applied electronics, electricity	3rd country, group	Kenya JKUAT	Edema P.	01.01 - 01.03	2.0
	(Instructor) Engineering	Group	Polytechnic University for Ability Development	Tumusime R.	01.04 - 01.12	9.0
	Applied electronics, electricity	3rd country, group	Kenya JKUAT	Apilke W.	02.01 - 02.03	2.0
Electricity section	Electricity engineering	C/P	Chiba Polytechnic Center	Mpanga A.	99.10 - 00.03	6.0
	Electricity engineering	C/P	Chiba Polytechnic Center	Asimwa L.	00.09 - 01.03	6.0
	Electricity engineering	C/P	Chiba Polytechnic Center	Nakakande	01.10 - 02.03	6.0
Machinery section	(Instructor) Production machinery	Group	Polytechnic University for Ability Development	J.Katungole	97.04 - 97.12	9.0
	Machine craft	C/P	Chiba Polytechnic Center	Bukirwa H.	97.09 - 98.03	7.0
	Machine processing	C/P	Chiba Polytechnic Center	P.Kyahuwa	98.10 - 99.03	6.0
	Heat treatment technology	3rd country, individual	Egypt CMRDI	Bukirwa H.	99.09 - 99.12	3.0
	(Instructor) machine engineering	C/P	Chiba Polytechnic Center	Mugombesya	01.10 - 02.03	6.0
Motor vehicle section	(Instructor) Industrial machinery	Group	Polytechnic University for Ability Development	N.Robert	98.04 - 98.12	9.0
	Automobile servicing	C/P	Chiba Polytechnic Center	P.Kaboobi	98.10 - 99.03	6.0
	Automobile servicing	Group	Higashi Yodogawa VTI	Madira A.	01.04 - 01.10	7.0
Wood working section	Wood processing skill	C/P	Chiba Polytechnic Center	Mugisha H.	98.10 - 99.03	6.0
	Moulding Engineering	Group	Polytechnic University for Ability Development	N.Robert	99.04 - 99.12	9.0
	Moulding Engineering	Group	Polytechnic University for Ability Development	Ssenyondo M.	01.04 - 01.12	9.0
Sheet metal section	Sheet metal skill	C/P	Chiba Polytechnic Center	Mwanga G.	97.10 - 98.03	6.0
	Sheet metal skill	C/P	Chiba Polytechnic Center	Mafabi P.	99.10 - 00.03	6.0
	General piping	C/P	Chiba Polytechnic Center	Kazibwa P.	00.09 - 01.03	6.0
	Automobile sheet metal	C/P	Chiba Polytechnic Center	Okeho A.	01.10 - 02.03	6.0
Welding section	Welding skill	3rd country, group	Egypt CMRDI	Mayanja F.	99.09 - 99.11	2.0
	Welding skill	C/P	Chiba Polytechnic Center	Wanyama I.	99.10 - 00.03	6.0
	Welding skill	C/P	Chiba Polytechnic Center	Namiasi S.	00.09 - 01.03	6.0
	Welding skill	3rd country, individual	Egypt CMRDI	Balta M.	00.09 - 00.11	2.0
	Gas ARC welding	C/P	Chiba Polytechnic Center	Mayanja F.	01.10 - 02.03	6.0
	Welding skill	3rd country, individual	Egypt CMRDI	Eliachu D.	01.09 - 01.11	2.0
Staff transferred to other VTI or resigned						
Training section	Seminar for training management	Group	Polytechnic University for Ability Development	Kurimanyire	94.10 - 94.12	3.0
	(Instructor) Electricity technology	Group	Polytechnic University for Ability Development	Oteka	95.04 - 95.12	9.0
	Seminar for training supervisor	C/P	Overseas Vocational Training Association	Oteka	99.01 - 99.02	2.0
Electronics section	(Instructor) Audio visual equipment	Group	Polytechnic University for Ability Development	Kirya	97.04 - 97.07	4.0
Electricity section	Electricity technology	C/P	Chiba Polytechnic Center	Sampala	97.10 - 98.03	6.0
Machinery section	(Instructor) Production machinery	Group	Polytechnic University for Ability Development	Ahagana	96.04 - 96.12	9.0
	Heat treatment technology	3rd country, group	Egypt CMRDI	E.Kirungi	99.09 - 99.12	3.0
Motor vehicle section	(Instructor) Production machinery	Group	Polytechnic University for Ability Development	Mubangizi	97.04 - 97.12	9.0
	(Instructor) Production machinery	Group	Polytechnic University for Ability Development	Mukasa	96.04 - 96.12	9.0
	Auto mobile service	Group	Higashi Yodogawa VTI	Kukubuya M.	99.10 - 00.03	6.0
Wood working section	(Instructor) Wood processing	Group	Polytechnic University for Ability Development	Kajungu	97.04 - 97.12	9.0
	(Instructor) Wood processing	Group	Polytechnic University for Ability Development	Katumba	96.04 - 96.12	9.0
Welding section	welding	3rd country, group	Egypt CMRDI	Wakabi	95.09 - 95.10	2.0
	welding	3rd country, individual	Egypt CMRDI	Wakabi	96.11 - 97.04	6.0
	welding skill	C/P	Chiba Polytechnic Center	Mujurizi	97.09 - 98.03	7.0

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Equipment List

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Unit Price	Total Price	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electronics										
'97/'98	97-01	Paturn Generator (Leader LT415PS)	230,000	460,000	2	0	2	A	A	
'97/'98	97-02	Variable Resister (Yokogawa 2791-12)	115,000	460,000	4	0	4	A	A	
'97/'98	97-03	Variable Resister (Yokogawa 2791-10)	115,000	460,000	4	0	4	A	A	
'97/'98	97-04	Variable Resister (Yokogawa 2791-08)	115,000	460,000	4	0	4	A	A	
'97/'98	97-05	Variable Resister (Yokogawa 2791-05)	115,000	460,000	4	0	4	A	A	
'97/'98	97-06	Variable Resister (Yokogawa 2791-03)	115,000	460,000	4	0	4	A	A	
'97/'98	97-07	Variable Resister (Yokogawa 2791-02)	115,000	460,000	4	0	4	A	A	
'97/'98	97-08	Variable Resister (Yokogawa 2791-01)	115,000	460,000	4	0	4	A	A	
'97/'98	97-09	Semi-Coinductor Experimental Apparatus	210,000	420,000	2	0	2	A	A	
'97/'98	97-10	Power Meter (Yokogawa 2041-02)	100,000	200,000	2	0	2	A	A	
'97/'98	97-11	Signal Generator (Kenwood SG-5155)	255,000	255,000	1	0	1	A	A	
'97/'98	97-12	Signal Generator (Leader 3216)	310,000	310,000	1	0	1	A	A	
'97/'98	97-13	AC Voltmeter (Kenwood VT-186)	124,000	248,000	2	0	2	A	A	
'97/'98	97-14	Function Generator (Kikusui 4502)	340,000	340,000	1	0	1	A	A	
'97/'98	97-15	Q-Meter (Meguro Denpa MQ-1601)	778,000	778,000	1	0	1	A	A	
'97/'98	97-16	One-Board Micro Computer (Showa Dengyo KENTAC800ZMARK II)	390,000	780,000	2	0	2	A	A	
'97/'98	97-17	Etching Kit (Sun Hayato ES-600)	629,000	629,000	1	0	1	C	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electronics								
'97/'98	97-18	Distortion Meter (Leader LDM-171)	1	0	1	A	A	
'97/'98	97-19	LCR Meter (Leader LCR-745)	1	0	1	A	A	
'97/'98	97-22	Oscilloscope (Iwatsu SS7804)	6	0	6	A	A	
'97/'98	97-23	Inductance (Yamabishi YSI-100)	4	0	4	A	A	
'97/'98	97-24	Variable Capacitance (Ando DSC-1)	1	0	1	A	A	
'97/'98	97-25	Level Meter (Ando TLM-36B)	1	0	1	A	A	
'97/'98	97-26	Circuit Training Kit (Iwatsu ITF-01)	2	0	2	A	A	
'97/'98	97-27	Frequency Modem Training Kit (Iwatsu ITF-204)	2	0	2	A	A	
'97/'98	97-28	Semi-Coinductor Training Kit (Iwatsu ITF-05)	2	0	2	A	A	
'97/'98	97-29	AD-DA Conversion Training Kit (Iwatsu ITF-203)	1	0	1	A	A	
'97/'98	97-30	Digital Storage Scope (Iwatsu DS-9242C)	1	0	1	A	A	
'97/'98	97-31	Universal Bridge (Ando LCR-6)	1	0	1	A	A	
'97/'98	97-32	Function Generator (Iwatsu SG-4101)	4	0	4	A	A	
'97/'98	97-33	Digital Multimeter (Iwatsu VOAC-7510)	12	0	12	A	A	
'97/'98	97-34	Variable Capacitor (Ando DSC-1)	1	0	1	A	A	
'97/'98	97-35	CRT Trainer (Iwatsu ITF-04)	1	0	1	A	A	
'97/'98	97-71	Desk Top Computer (Compaq Desk Pro 2000)	9	0	9	A	A	

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Equipment List

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electronics								
'97/'98	97-72	Laser Printer (HP Laserjet 6P)	4	0	4	A	A	
'97/'98	97-73	Desk Top Computer (Gateway GP5-166)	4	0	4	A	A	
'98/'99	98-03	Oscilloscope (Kenwood CS-5355)	4	0	4	A	A	
'98/'99	98-04	Regulated DC Power Supply (Kenwood PS36-10)	4	0	4	A	A	
'98/'99	98-05	Slide Rheostat (Yokogawa 2791-01)	2	0	2	A	A	
'98/'99	98-06	Slide Rheostat (Yokogawa 2791-02)	2	0	2	A	A	
'98/'99	98-07	Slide Rheostat (Yokogawa 2791-03)	2	0	2	A	A	
'98/'99	98-08	Slide Rheostat (Yokogawa 2791-08)	2	0	2	A	A	
'98/'99	98-09	Slide Rheostat (Yokogawa 2791-10)	2	0	2	A	A	
'98/'99	98-10	Slide Rheostat (Yokogawa 2791-12)	2	0	2	A	A	
'98/'99	98-11	Patern Generator (Leader LT415PS)	2	0	2	A	A	
'98/'99	98-12	Color Patern Generator (Kenwood CG-932)	1	0	1	A	A	
'98/'99	98-13	Q-Meter (Meguro Denpa MQ-1601)	1	0	1	A	A	
'98/'99	98-14	Inductance (Yamabishi YSI-100)	1	0	1	A	A	
'98/'99	98-15	Vectorscope (Kenwood CV-1255)	1	0	1	A	A	
'98/'99	98-16	Signal Level Meter (Leader 953)	2	0	2	A	A	
'98/'99	98-17	Sweep Generator (Leader LSW-251)	2	0	2	A	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electronics								
'98/'99	98-18	Standard Signal Generator (Kenwood SG-7130)	1	0	1	A	A	
'98/'99	98-19	Universal Bridge (Yamabishi YHBR-2B)	2	0	2	A	A	
'98/'99	98-20	Distortion Meter (Leader LDM-171)	2	0	2	A	A	
'98/'99	98-21	Circuit Trainer (Shimadzu YD-10)	2	0	2	A	A	
'98/'99	98-22	AD-DA Converter Training Apparatus (Shimadzu ADH-105)	2	0	2	A	A	
'98/'99	98-23	Semiconductor Experiment Apparatus (Shimadzu KSC-3N)	2	0	2	A	A	
'98/'99	98-42	Pulse Generator (Nihon HP 8110A)	1	0	1	A	A	
'98/'99	98-43	Color TV Training System (yamato Denshi ET-TV3)	1	0	1	A	A	
'98/'99	98-44	Basis Etching Set (Sun Hayato Z920)	1	0	1	C	A	
'99/'00	99-01	Oscilloscope (Kenwood CS-5350)	4	0	4	A	A	
'99/'00	99-02	Regulated DC Power Supply (Kenwood PS36-10)	1	0	1	A	A	
'99/'00	99-03	Slide Rheostat (Yokogawa 2791-01)	2	0	2	A	A	
'99/'00	99-04	Slide Rheostat (Yokogawa 2791-02)	2	0	2	A	A	
'99/'00	99-05	Slide Rheostat (Yokogawa 2791-03)	2	0	2	A	A	
'99/'00	99-06	Slide Rheostat (Yokogawa 2791-08)	2	0	2	A	A	
'99/'00	99-07	Slide Rheostat (Yokogawa 2791-10)	2	0	2	A	A	
'99/'00	99-08	Slide Rheostat (Yokogawa 2791-12)	2	0	2	A	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electronics								
'99/'00	99-09	Q-Meter (Meguro Denpa MQ-1601)	1	0	1	A	A	
'99/'00	99-10	Inductance (Yamabishi YSI-100)	1	0	1	A	A	
'99/'00	99-11	Vectorscope (Kenwood CV-1255)	1	0	1	A	A	
'99/'00	99-12	Circuit Trainer (Shimadzu YD-10)	1	0	1	A	A	
'99/'00	99-13	AD-DA Converter Training Appratus (Shimadzu ADH-105)	1	0	1	A	A	
'99/'00	99-14	Semiconductor Experiment Apparatus (Shimadzu KSC-3N)	1	0	1	A	A	
'00/'01	00-01	Color Paturm Generator (Kenwood CG-932)	1	0	1	A	A	
'00/'01	00-02	Vectorscope (Kenwood CV-1255)	1	0	1	A	A	
'00/'01	00-03	Universal Bridge (Yamabishi YHBR-2B)	2	0	2	A	A	
'00/'01	00-04	Circuit Trainer (Shimadzu YD-10)	2	0	2	A	A	
'00/'01	00-05	Semiconductor Experiment Apparatus (Shimadzu KSC-3N)	1	0	1	A	A	
'00/'01	00-16	Desk Top Computer (Compaq Desk Pro)	13	0	13	A	A	
'00/'01	00-17	Laser Printer (Conon LBP 1760)	2	0	2	A	A	
'00/'01	00-18	Lap Top Computer (Toshiba 4340 DVD)	2	0	2	A	A	
'00/'01	00-19	Internet Equipment	1	0	1	A	A	
'00/'01	00-20	Multi Media Projector (Canon LV-5300)	1	0	1	A	A	
'01/'02	01-01	Logic Analyzer (Ajilent Technology E9340A)	2	0	2	-	-	
'01/'02	01-02	Color Printer (Cannon LBP-2050N)	1	0	1	-	-	

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Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Electricity								
'97/'98	97-20	Condensing Unit (Takagi Reiki TWX-220L)	1	0	1	A	A	
'98/'99	98-24	Grinder (Hitachi GR-26)	1	0	1	A	A	
'98/'99	98-25	Generator (Denyo GA-2300)	2	0	2	A	A	
'98/'99	98-26	DC Power Supply (Kikusui PAN160-3.5A)	5	0	5	A	A	
'98/'99	98-27	Regulated DC Power Supply (Matsunaga DS-5310-J)	5	0	5	A	A	
'98/'99	98-28	Regulated Power Supply (Kenwood PS36-10)	1	0	1	A	A	
'98/'99	98-29	Battery Charger (Nissan BS6565-0001)	1	0	1	A	A	
'98/'99	98-30	Digital Storage Oscilloscope (Kenwood DCS-8300)	1	0	1	A	A	
'98/'99	98-45	Sequence System Training Board (Fuji Denki)	15	0	15	A	A	
'98/'99	98-47	Winding Machine (Tokyo Makisen SD-110N)	3	0	3	A	A	
'98/'99	98-70	Lap Top Computer (Toshiba 330CDS)	2	0	2	A	A	
'98/'99	98-71	Air Conditioner (Carrier 30VA7018)	1	0	1	A	A	
'99/'00	99-16	Sequence System Training Board (Fuji Denki)	7	0	7	A	A	
'99/'00	99-17	Sequence Controlled Air Trainer (Keimei Kosan)	2	0	2	A	A	
'99/'00	99-18	Air Compressor (Yaezaki PC3-EAD)	1	0	1	A	A	
'99/'00	99-19	Soft Ware (Omron C500-ZL3AT1-E)	1	0	1	A	A	
'99/'00	99-45	Air Conditioner (Daikin 16000 BTU/HR)	3	0	3	A	A	
'99/'00	99-46	Air Conditioner (Daikin 12000 BTU/HR)	2	0	2	A	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Machining								
'97/'98	97-65	Single Point Tool Grinder (Ito DP-2NS)	1	0	1	C	A	
'97/'98	97-74	Desk Top Compyuter	1	0	1	A	A	
'99/'00	99-21	Machine Vice (Hikari Seiki HL-130N)	1	0	1	A	A	
'99/'00	99-22	Grinding Unit (UHT GU-1NEW)	1	0	1	A	A	
'99/'00	99-23	Hydraulic Press Machine (Masada MHP-15)	1	0	1	A	A	
'99/'00	99-24	Milling Aubur (Takura NT50x25.4x700)	1	0	1	A	A	
'00/'01	00-06	Air Compressor (Arnest Iwata TLD22-14)	1	0	1	A	A	
Motorvehicle								
'97/'98	97-75	Diesel Engine for Practice	4	0	4	B	A	
'98/'99	98-31	Diesel Injection Pump Tool Set (Banzai DT-105A)	3	0	3	B	A	
'98/'99	98-32	Connecting Rod Aligner (Banzai MA-5E)	1	0	1	B	A	
'98/'99	98-33	Connecting Rod Aligner (Banzai MA-5B)	1	0	1	B	A	
'98/'99	98-34	Micrometer (Nissan GG9210)	3	0	3	B	A	
'99/'00	99-26	Micrometer (Mitsutoyo NO.133-902)	1	0	1	A	A	
'99/'00	99-27	Fender Tool Board Set (Iyasaka PF-DS)	1	0	1	A	A	
'00/'01	00-07	Oscilloscope (Kenwood SC-5355)	2	0	2	B	A	
'00/'01	00-08	DC Regulated Power Supply (Kenwood PS36-10)	2	0	2	A	A	
'00/'01	00-09	Oil Pressure Meter Set (Banzai HT-G)	1	0	1	B	A	

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Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Motorvehicle								
'00/'01	00-29	Two Post Lift (Dead Man 253-2.5Tonne)	1	0	1	A	A	
'01/'02	01-03	Air Tank (Nissan Artia WS3951-0001)	1	0	1	-	-	
Woodworking								
'97/'98	97-36	Wood Planing Machine (Kuwahara KP-300LDX)	1	0	1	A	A	
'97/'98	97-38	Circular Sawing Machine (Eiwa AT-GD-16)	1	0	1	A	A	
'97/'98	97-39	Band Saw (Johnan JBS-650-G)	1	0	1	A	A	
'97/'98	97-41	Router Machine (Shoda RO-116)	1	0	1	A	A	
'97/'98	97-42	Dove-tail Machine (Shoda DV-121)	1	0	1	B	A	
'97/'98	97-43	Corner Locking Machine (Shoda CL-132)	1	0	1	A	A	
'97/'98	97-45	Hollow Chisel Mortiser (Miyagawa MKE)	1	0	1	A	A	
'97/'98	97-47	Grinder (Hitachi Koki GR31)	1	0	1	A	A	
'97/'98	97-48	Scroll Saw (Asahi Koki 1300)	1	0	1	B	A	
'97/'98	97-50	Belt Sander (Hasegawa HUS-1200)	1	0	1	A	A	
'97/'98	97-51	Saw Setting Machine (Tokai TN-3)	1	0	1	B	A	
'97/'98	97-52	Saw Setting Machine (Tokai TN-4)	1	0	1	B	A	
'97/'98	97-53	Wood Moisture Meter (Kett HM-520)	2	0	2	B	A	
'97/'98	97-76	Vacume Cleaner (Made in Germany)	4	0	4	A	A	
'97/'98	97-77	Air Compressor	1	0	1	A	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Woodworking								
'97/'98	97-78	Portable Belt Sander	2	0	2	A	A	
'97/'98	97-79	Chain Saw	2	0	2	A	A	
'98/'99	98-35	Knife Grinder (Marunaka GLE-640mm)	1	0	1	A	A	
'98/'99	98-52	Circular Saw with Tilting Arbor (Eiwa Kikai UTA-16)	1	0	1	A	A	
'98/'99	98-53	Circular Saw with Tilting Table (Eiwa Kikai AECR-16)	1	0	1	A	A	
'98/'99	98-54	Chamfering achine (Shoda Tekko SM-123)	1	0	1	B	A	
'98/'99	98-55	Saw Blade Grinder (Tokai Netsushori TN-2)	1	0	1	B	A	
'98/'99	98-72	Dowel Mchine (Wilkinson)	1	0	1	A	A	
'98/'99	98-73	Dowel Cut Machine (Wilkinson)	1	0	1	A	A	
'98/'99	98-74	Pallet Fork Lift Jacks	1	0	1	A	A	
'99/'00	99-47	Heavy Duty Dust Extractor (MDE HC-329)	1	0	1	A	A	
'99/'00	99-50	Heavy Duty Dust Extractor (MDE HC-329)	3	0	3	A	A	
'00/'01	00-10	Cleaner (Hako SZ-220)	1	0	1	A	A	
'00/'01	00-30	Panel Raising Cutter (No.4128)	1	0	1	A	A	
'00/'01	00-31	Band Saw Blade Jointer (Blade width 5-30mm)	1	0	1	B	A	
'00/'01	00-21	Combined Planer Thicknesser (HC410G-5.5DNB)	1	0	1	A	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Sheetmetal								
'97/'98	97-54	Spot Welding Machine (Daido)	1	0	1	C	A	
'97/'98	97-57	Shearing Machine (Yoshimitsu 2.0x1000)	1	0	1	D	A	For the measure of power failure
'97/'98	97-59	Tie Setting Roll (Yoshimitsu 300x300)	1	0	1	B	A	
'97/'98	97-60	Grinder (Showa Denki SGF-CFX4)	1	0	1	A	A	
'97/'98	97-61	Bending Roll (Noguchi 13M3)	1	0	1	C	A	
'97/'98	97-63	Pipe Bender (Taiyo PB-LC4E)	1	0	1	C	A	
'97/'98	97-64	Power Lifter (Kanto 500S)	1	0	1	A	A	
'97/'98	97-80	Lap Top Computer	1	0	1	A	A	
'98/'99	98-36	High Speed Cutting Machine (Hitachi CC16SB)	1	0	1	B	A	
'98/'99	98-37	Hand Pallet Track (Sugiyama BM10SS-L40)	1	0	1	B	A	
'98/'99	98-38	Hand Pallet Track (Sugiyama BM30LL)	1	0	1	B	A	
'98/'99	98-39	Tool Set (KTC MK81)	3	0	3	B	A	
'98/'99	98-60	Vibrating Shearing Machine (Horita Kikai HM-5)	1	0	1	B	A	
'98/'99	98-61	Contour Machine (Kiyota Koki KY-300)	1	0	1	B	A	
'98/'99	98-63	Belt Grinder (Yodogawa YS-3N)	2	0	2	A	A	
'99/'00	99-31	Buttery Welder (Maito NEO LUPUS 150MF)	2	0	2	B	A	
'99/'00	99-32	Air Compressor (Arnest Iwata TLD22-14)	1	0	1	B	A	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Sheetmetal								
'99/'00	99-33	MAG Welding Machine (Daihen AUTOTAC UR200)	1	0	1	B	A	
'99/'00	99-43	Set of Stock & Die 1/2-2" (Lisag BSP Ratchet Type)	6	0	6	B	A	
'99/'00	99-44	Pipe Threading Machine (Rex N50A)	1	0	1	B	A	
Welding								
'97/'98	97-66	CO2 Gas-Shield Arc Welder (Daihen XC-350)	1	0	1	A	A	
'98/'99	98-40	Water-Hydraulic Pump (Yamamoto PH-60)	1	0	1	C	A	
'98/'99	98-41	Spark Test Booth (Yamamoto Kagaku)	1	0	1	B	A	
'98/'99	98-65	CO2 Gas-Shield Arc Welder (Daihen XC-350)	2	0	2	A	A	
'99/'00	99-35	Industrial Microscope (Orimpus BX60-31E31MB)	1	0	1	A	A	
'99/'00	99-36	Sample Polisher (Takara TW-2S)	1	0	1	B	A	
'99/'00	99-37	Standard Micro Structure (Yamamoto Kagaku Group 1)	1	0	1	B	A	
'99/'00	99-38	Standard Micro Structure (Yamamoto Kagaku Group 2)	1	0	1	B	A	
'99/'00	99-39	Injection Welder (Nihon Yuteku Superjet Eutalloy Kit)	1	0	1	B	A	
'99/'00	99-40	Specimen Dryer (Marumoto 8307)	1	0	1	B	A	
'00/'01	00-13	Standard Test Block (Tokimeck JIS STB-A1)	2	0	2	C	A	
'00/'01	00-14	Standard Test Block (Tokimeck JIS STB-A2)	2	0	2	C	A	
'00/'01	00-15	Standard Test Block (Tokimeck JIS STB-G Set)	1	0	1	C	A	
'01/'02	01-04	Air Cutting Machine (Daihen D-12000)	1	0	1	-	-	

Provided Equipments by JICA (List of the equipments which has costed 1,000,000~1,600,000 J-yen)

Year	No.	Name of the Equipment	Number of Provision	Number of disposition	Number of Possession	Condition of Use	Condition of Management	Note
Common Use								
'97/'98	97-21	Drafting Set (Uchida BP-3/800-5803)	13	0	13	B	A	
'97/'98	97-69	Copy Machine (Mita DC-3060)	1	0	1	A	A	
'97/'98	97-70	Fax Machine (Mita TC-710)	1	0	1	A	A	
'98/'99	98-01	Drafting Table Set (Kokuyo TR-A2W-SV16N)	4	0	4	B	A	
'98/'99	98-02	Drafting Table Set (Uchida BP-D)	2	0	2	B	A	
'98/'99	98-68	Desk Top Computer (Compaq DeskPRO)	8	0	8	A	A	
'98/'99	98-69	Printing Machine (Duplo DP-2030)	1	0	1	B	A	
'99/'00	99-42	Copy Machine (Mita DC-2560)	1	0	1	A	A	
'99/'00	99-48	Lap Top Computer (Compaq ARMADA E500)	1	0	1	A	A	
'99/'00	99-49	Printer (Canon LBP-1760)	3	0	3	A	A	
'00/'01	00-22	Desk Top Computer (Compaq DeskPRO)	20	0	20	A	A	For Intra-Network
'00/'01	00-23	Desk Top Computer (Compaq Server ML-350)	1	0	1	A	A	For Intra-Network
'00/'01	00-25	Lap Top Computer (Tosiba 4340DVD)	3	0	3	A	A	
'00/'01	00-26	Multi Media Projector (Canon LV-7320)	3	0	3	B	A	
'00/'01	00-27	Screen (2371x2070)	1	0	1	B	A	
'00/'01	00-28	Screen (1714x1785)	3	0	3	B	A	

Equipment List

Provided Equipments by JICA (List of the equipments which has costed more than 1,600,000 J-yen)

Year	No.	Name of the Equipment	Price	Quantity	Place of Use	Condition of Use	Condition of Management	Note
Electronics								
'99/'00	99-15	Color TV Training System (Fuji Dinamics FT-212P)	1,656,000	1	Electronics Section Practice Room	A	A	
Electricity								
'98/'99	98-46	Sequence Control System Training Model (Showa Dengyo KENTAC 2211)	2,200,000	1	Electricity Section Practice Room	A	A	
Machining								
'98/'99	98-48	Surface Grinding Machine (Okamoto Kosaku GS-63Z)	7,300,000	1	Machining Section Practice Room	A	A	
'98/'99	98-49	Slotter Machine (Nakabo Tekkosho NSP-110)	2,700,000	1	Machining Section Practice Room	A	A	
'99/'00	99-20	Universal Tool Grinder (Makino C-40)	4,400,000	1	Machining Section Practice Room	B	A	
Motorvehicle								
'98/'99	98-50	Distributor Test Bench (Annzenn Jidosha DS-747)	1,720,000	1	Motorvehicle Section Practice Room	B	A	
'98/'99	98-51	Fuel Injection Pump Tester (Banzai MM875/3)	10,500,000	1	Motorvehicle Section Practice Room	B	A	
'99/'00	99-25	Cylinder Honing Machine (Banzai H-260M)	7,700,000	1	Motorvehicle Section Practice Room	B	A	
Woodworking								
'97/'98	97-37	Wood Planing Machine (Kuwahara KU-H500D)	2,500,000	1	Woodworking Section Practice Room	A	A	
'97/'98	97-40	Lathe (Fujikyu FT-18)	2,300,000	1	Woodworking Section Practice Room	B	A	
'97/'98	97-44	Tool Grinder (Shoda SG-113A)	1,800,000	1	Woodworking Section Practice Room	B	A	
'97/'98	97-46	Tenoning Machine (Kuwahara KT-334E)	1,800,000	1	Woodworking Section Practice Room	A	A	

Provided Equipments by JICA (List of the equipments which has costed more than 1,600,000 J-yen)

Year	No.	Name of the Equipment	Price	Quantity	Place of Use	Condition of Use	Condition of Management	Note
Woodworking								
'97/'98	97-49	Ripping Saw (Kikukawa RP-12)	3,444,000	1	Woodworking Section Practice Room	A	A	
'98/'99	98-56	Press Machine (Takagi Kinzoku F16-20)	3,600,000	1	Woodworking Section Practice Room	A	A	
'98/'99	98-57	Boring Machine (Toyo Tekkosho SB-600D)	2,650,000	1	Woodworking Section Practice Room	A	A	
'98/'99	98-58	Panel Saw (Sincs SZIII-8000)	3,100,000	1	Woodworking Section Practice Room	A	A	
'99/'00	99-28	Rdial Arm Crosscut Saw (Okumura ACG-11)	2,300,000	1	Woodworking Section Practice Room	A	A	
'99/'00	99-29	Finishing Surface Planner (Marunaka Royal 14FX-Custom)	2,900,000	1	Woodworking Section Practice Room	B	A	
'99/'00	99-30	Belt Grinder (Hasegawa BS-2200)	2,100,000	1	Woodworking Section Practice Room	B	A	
'00/'01	00-11	Table Press Machine (Kobayashi KK-3D 458 Type)	2,377,000	1	Woodworking Section Practice Room	A	A	
Sheetmetal								
'97/'98	97-55	Corner Shearing Machine (Amada CSW-250)	1,632,000	1	Sheetmetal Section Practice Room	B	A	
'97/'98	97-56	Square Shearing Machine (Noguchi NS-1506)	3,200,000	1	Sheetmetal Section Practice Room	A	A	
'97/'98	97-58	Press Brake (Amada RG-50)	3,485,000	1	Sheetmetal Section Practice Room	C	A	
'97/'98	97-62	Bending Machine (Noguchi H800)	2,300,000	1	Sheetmetal Section Practice Room	B	A	
'98/'99	98-59	Set Press Set (Amada SP30IISS104IV)	6,600,000	1	Sheetmetal Section Practice Room	B	A	
'98/'99	98-62	Universal Pipe Bender Machine (Daido Kogyo C203HV)	2,600,000	1	Sheetmetal Section Practice Room	B	A	

Equipment List

Provided Equipments by JICA (List of the equipments which has costed more than 1,600,000 J-yen)

Year	No.	Name of the Equipment	Price	Quantity	Place of Use	Condition of Use	Condition of Management	Note
Welding								
'98/'99	98-64	Weld Joint Beveller (Sincs FK115)	3,250,000	1	Welding Section Practice Room	B	A	
'98/'99	98-66	Auto Metal Cutter (Takawa Seiki ST-300)	2,650,000	1	Welding Section Practice Room	B	A	
'99/'00	99-34	Spot Welding Machine (Chuo Seisakusha CS-5-3000)	3,600,000	1	Welding Section Practice Room	B	A	
'00/'01	00-12	Ultrasonic Tester (Tokimech SM-102)	1,860,000	2	Welding Section Practice Room	C	A	
Common Use								
'97/'98	97-68	Wagon Type Motor-Vehicle (Mitsubishi L-400)	3,640,000	1	Nakawa VTI	A	A	
'98/'99	98-67	Mini Bus (Mitsubishi Rosa)	4,654,000	1	Nakawa VTI	B	A	
'99/'00	99-41	2 tonne Truck (Mitsubishi canter)	2,557,000	1	Nakawa VTI	A	A	
'00/'01	00-24	4WD Motor-Vehicle (Nissan Patrol GL5-Door)	3,337,500	1	Nakawa VTI	A	A	

Note: Condition of use

A : Being used very frequently.(daily)

B : Being used often.(from one to three times a week)

C : It has been used consecutively at certain times.(indicate the reason in the column of reference or disposal.)

D : It has not been used often so far.(from three to 11 times annually. indicate reason in column of reference or disposal.)

E : It has not been in use due to particular reasons. (indicate reasons in column of reference or disposal.)

Note: Condition of management

A : It has been serviced well with regular check-ups, and can be used any time necessary.

B : Management is done on the whole, and has no problem in usage.

C : If serviced, it can be used.

D : It can hardly be used.

ANNEX 3.5

Budget Allocation

Nakawa Vocational Training Institute Budget 1997/98 – 2000/2001

A. Capital Development

(Thousand U. Sch.)

Item	1997/1998	1998/1999	1999/2000	2000/2001	Total
Construction & Building	111,649	44,156	180,000	29,025	364,830
Other Fixed Assets	22,150	3,020	2,513		27,683
Local Salaries & Wages		8,027	9,361	77,638	95,026
Allowances	2,443	20,945	8,489	4,976	36,853
Training	2,277	10,423	3,911	58,667	75,278
Vehicle Operation & Maintenance	6,645	65,031	14,144	20,802	106,622
Consumables	3,161	31,668	112,985	5,266	153,080
Utilities		8,399	27,242	746	36,387
Property Costs		1,300	5,616		6,916
Other goods & services				30,349	30,349
Tax Arrears		14,609			14,609
Total	148,325	207,578	364,261	227,469	933,024

B. Recurrent Expenditure Release


(Thousand U. Sch.)

Item	1997/1998	1998/1999	1999/2000	2000/2001	Total
Recurrent Expenditure Release	32,666	68,610	59,396	39,116	199,788
Official Opening			8,010		8,010
Total	32,666	68,610	67,406	39,116	207,798

Note: Finance year is from July to June.



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**Nakawa Vocational Training Institute Work and Equipment by Uganda Side
Facilities**

(U.Shc.)

Description		Cost
A. Maintenance and Construction Work carried out by the government of Uganda		
(a) Facilities Constructed		
1	Block and metallic fence of approximately 937 metres constructed around the Institute from 1997-2000	253,655,000
2	Garage for motor vehicle section still under construction started from 2000	57,007,608
3	Main store with 3 separate entrances and 2 already in use started in 1999	21,434,128
4	Soak pit constructed in 2000	1,338,000
5	Kitchen extension for charcoal stove constructed in 1999	1,032,200
6	Extension for sheet metal section done in 1998	2,800,000
7	Construction of concrete footpaths done in 1998 - 1999	1,271,100
	Subtotal	338,538,036
(b) Facilities renovated/modified.		
1	Staff quarters renovated in 1999/2000	1,050,000
2	Warden's residence renovated in 1999/2000	320,000
3	Lavatories administration block and old student's Lavatories modified and renovated in 1998/99/2000	3,022,500
4	New workshop lavatories modified in 1999	335,000
5	Re-painting of administration block done in 2000/2001	17,505,000
6	Levelling of ground and compound in progress	2,460,000
7	Cleaning of bush around the Institute in progress	6,040,000
8	Beautifying of compound in progress	4,140,750
	Subtotal	34,873,250
2. Equipment Bought		
1	Two grass cutting machines acquired in 2000	3,638,700
2	One computer and its accessories acquired in 1999	4,015,000
3	One printer acquired in 1997	1,462,500
	Subtotal	9,116,200
Grand total		382,527,486

ANNEX 5-1

Uganda NAKAWA Vocational Training Institute
Achievement of the plan for each section

SECTION; Training Planning

1. INPUT	<p>(Japan side)</p> <p>1. Long term Experts: Mr.Toru Kawashima 2. Short term Experts: Mr.Koji Ueda (Other 5) 3. C/P Training: Mr.A.Tuzinde (8 in Japan , 1 in 3rd Country)</p>	<p>(Uganda side)</p> <p>1. Assignment of C/P: Mr. A.Masalo (10 counterparts) (resigned 4 , transferred 1) Present 5</p>
2. ACTIVITIES	<p>1-1) To secure Uganda counterpart personnel necessary for implementing vocational training.</p> <p>1-2) To establish management system of the Institute.</p> <p>1-3) To implement the income generation activities.</p> <p>1-4) To run the Institute by the Committees.</p> <p>1-5) To select and install machinery and equipment suitable for vocational training.</p> <p>1-6) To maintain machinery and equipment for vocational training properly.</p>	<p>1-1) One counterpart in machining section has not assigned yet, however the C/P personnel in the other 6 sections and administration division are adequate.</p> <p>1-2) Management system has been established.</p> <p>1-3) Implementation and management system for income generation activities has been established.</p> <p>1-4) Institute management system conducted by 6 committees has been established.</p> <p>1-5) Suitable equipments for vocational training has been selected and installed.</p> <p>1-6) Maintenance system of equipment for vocational training has been established.</p>
3. OUTCOME	<p>1. Necessary facilities, equipment and personnel are set up in the seven fields.</p>	<p>1) Necessary facilities, equipment and personnel were set up in the seven fields.</p>
4. PROJECT PURPOSE	<p>Skilled craftsmen /women needed by industries are produced in the seven fields (machining, electricity, welding, sheet metal, motor vehicle, electronics, carpentry)</p>	<p>The class intake of 1998 in Electricity, Machining, Motor vehicle, Welding section graduated and the intake of 1999 in the seven sector graduated until year 2001.</p> <p>In the section of Machining, Electricity, Welding, Sheet metal, the system which trained skilled craftsmen /women needed by industries has been established.</p> <p>In the section of Electronics, Motor vehicle, Woodworking, establishment of said system is not completed due to as below.</p> <p>In the section of Electronics and Motor vehicle, the training curriculum was revised to meet the new industrial needs.</p> <p>In Woodworking section, some of C/P have resigned</p>

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Uganda NAKAWA Vocational Training Institute
Achievement of the plan for each section

SECTION : Electronics

31st,Oct,200

1. INPUT	<p>Japan side</p> <ol style="list-style-type: none"> 1. Longterm Expert : Mr.Kazuaki Sato, Mr.Mitsunori Hirakawa 2. Shortterm Expert : None 3. Counterpart Training : Mr.F.Omoo (5 in JAPAN, 3 in 3rd Country) <p>Uganda side</p> <ol style="list-style-type: none"> 1. Counterpart : Mr.F.Omoo (Assigned 9 Instructors; 3 out of 9 transferred) 								
2. ACTIVITY	<table border="1"> <tr> <td> <p>Basic Training (Day Time)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p> </td> <td> <p>Day time training course started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of 2-year training system. (Theory 25% Practice 75%). This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year(Analogue Electronics I, Digital Electronics I, Computer System I, etc.) 2nd year (Analogue Electronics II, Digital Electronics II, Computer System II, etc.)</p> <p>Improve counterpart's skills for managing of electronics section, maintenance of equipment, making of texts and training materials, teaching methods, revising of curriculum and syllabus .</p> </td> </tr> <tr> <td> <p>Upgrading Training</p> <p>Training Target</p> <p>Training Contents</p> <p>Technology Transfer</p> </td> <td> <p>Upgrading training course started in 1999.</p> <p>Established for workers of industries.</p> <p>Ready-made and tailor-made training courses according to the various training needs from industries.</p> <p>Improve counterpart's skills for developing upgrading training courses.</p> </td> </tr> <tr> <td> <p>Basic Training (Evening Class)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p> </td> <td> <p>Evening class started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training (day time).</p> <p>Skills and technology transferred in connection with Basic training(day time) .</p> </td> </tr> <tr> <td> <p>Developing Training</p> <p>Materials & Curriculum</p> </td> <td> <p>Develop and revise the curriculum & syllabus for all subjects which include nessesary subjects for the certificate of craftsman. NAKAWA VTI has the committee for curriculum and syllabus. In case of Electronics section , developing training materials by using personal computer. For electronics section, Syllabus and curriculum were changed to have advanced technology system of IT(Information Technology).</p> <p>Developed training materials for business management by Cooperating to UNIDO.</p> </td> </tr> </table>	<p>Basic Training (Day Time)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p>	<p>Day time training course started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of 2-year training system. (Theory 25% Practice 75%). This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year(Analogue Electronics I, Digital Electronics I, Computer System I, etc.) 2nd year (Analogue Electronics II, Digital Electronics II, Computer System II, etc.)</p> <p>Improve counterpart's skills for managing of electronics section, maintenance of equipment, making of texts and training materials, teaching methods, revising of curriculum and syllabus .</p>	<p>Upgrading Training</p> <p>Training Target</p> <p>Training Contents</p> <p>Technology Transfer</p>	<p>Upgrading training course started in 1999.</p> <p>Established for workers of industries.</p> <p>Ready-made and tailor-made training courses according to the various training needs from industries.</p> <p>Improve counterpart's skills for developing upgrading training courses.</p>	<p>Basic Training (Evening Class)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p>	<p>Evening class started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training (day time).</p> <p>Skills and technology transferred in connection with Basic training(day time) .</p>	<p>Developing Training</p> <p>Materials & Curriculum</p>	<p>Develop and revise the curriculum & syllabus for all subjects which include nessesary subjects for the certificate of craftsman. NAKAWA VTI has the committee for curriculum and syllabus. In case of Electronics section , developing training materials by using personal computer. For electronics section, Syllabus and curriculum were changed to have advanced technology system of IT(Information Technology).</p> <p>Developed training materials for business management by Cooperating to UNIDO.</p>
<p>Basic Training (Day Time)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p>	<p>Day time training course started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of 2-year training system. (Theory 25% Practice 75%). This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year(Analogue Electronics I, Digital Electronics I, Computer System I, etc.) 2nd year (Analogue Electronics II, Digital Electronics II, Computer System II, etc.)</p> <p>Improve counterpart's skills for managing of electronics section, maintenance of equipment, making of texts and training materials, teaching methods, revising of curriculum and syllabus .</p>								
<p>Upgrading Training</p> <p>Training Target</p> <p>Training Contents</p> <p>Technology Transfer</p>	<p>Upgrading training course started in 1999.</p> <p>Established for workers of industries.</p> <p>Ready-made and tailor-made training courses according to the various training needs from industries.</p> <p>Improve counterpart's skills for developing upgrading training courses.</p>								
<p>Basic Training (Evening Class)</p> <p>Training Target</p> <p>Subject</p> <p>Technology Transfer</p>	<p>Evening class started in 1999.</p> <p>Trainees with minimum o' level qualification .</p> <p>Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training (day time).</p> <p>Skills and technology transferred in connection with Basic training(day time) .</p>								
<p>Developing Training</p> <p>Materials & Curriculum</p>	<p>Develop and revise the curriculum & syllabus for all subjects which include nessesary subjects for the certificate of craftsman. NAKAWA VTI has the committee for curriculum and syllabus. In case of Electronics section , developing training materials by using personal computer. For electronics section, Syllabus and curriculum were changed to have advanced technology system of IT(Information Technology).</p> <p>Developed training materials for business management by Cooperating to UNIDO.</p>								
3. Outcome	<table border="1"> <tr> <td> <p>Day time Training</p> <p>Achievement Situation & Problem, etc.</p> </td> <td> <p>GOOD</p> <p>Finished making texts and materials for all subjects except applied technology of Analogue-IC, PLD(Programable Logic Device), One-chip Microprocessor , computer hardware and software in electronics section.</p> <p>Assigned 6 instructors and be prepared to manage this section.</p> <p>Upgrading of the skills of these subjects is necessary.</p> <p>Since advanced technology transfer is very important in industries in Uganda.</p> </td> </tr> <tr> <td> <p>Upgrading Training</p> <p>Achievement Situation & Problem, etc.</p> </td> <td> <p>VERY GOOD</p> <p>Developed 15 upgrading training courses during 3 years and made training materials for that courses based on Basic training subjects.</p> <p>Various upgrading training courses and training materials suitable for industrial needs should be developed, since there is a lot of needs for IT in Uganda.</p> </td> </tr> <tr> <td> <p>Evening Class</p> <p>Achievement Situation & Problem, etc.</p> </td> <td> <p>Improved counterpart's skills for teaching method,and developed texts and training materials suitable for Basic training(day time).</p> </td> </tr> </table>	<p>Day time Training</p> <p>Achievement Situation & Problem, etc.</p>	<p>GOOD</p> <p>Finished making texts and materials for all subjects except applied technology of Analogue-IC, PLD(Programable Logic Device), One-chip Microprocessor , computer hardware and software in electronics section.</p> <p>Assigned 6 instructors and be prepared to manage this section.</p> <p>Upgrading of the skills of these subjects is necessary.</p> <p>Since advanced technology transfer is very important in industries in Uganda.</p>	<p>Upgrading Training</p> <p>Achievement Situation & Problem, etc.</p>	<p>VERY GOOD</p> <p>Developed 15 upgrading training courses during 3 years and made training materials for that courses based on Basic training subjects.</p> <p>Various upgrading training courses and training materials suitable for industrial needs should be developed, since there is a lot of needs for IT in Uganda.</p>	<p>Evening Class</p> <p>Achievement Situation & Problem, etc.</p>	<p>Improved counterpart's skills for teaching method,and developed texts and training materials suitable for Basic training(day time).</p>		
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<p>Upgrading Training</p> <p>Achievement Situation & Problem, etc.</p>	<p>VERY GOOD</p> <p>Developed 15 upgrading training courses during 3 years and made training materials for that courses based on Basic training subjects.</p> <p>Various upgrading training courses and training materials suitable for industrial needs should be developed, since there is a lot of needs for IT in Uganda.</p>								
<p>Evening Class</p> <p>Achievement Situation & Problem, etc.</p>	<p>Improved counterpart's skills for teaching method,and developed texts and training materials suitable for Basic training(day time).</p>								
4. Implementation of Project Purpose	<p>1. Half of all subjects will be finished to transfer skills for selecting and installing equipment until the end of project. It is difficult to finish to transfer skill about applied tchonology of Analogue-IC, PLD, One-chip Microprocessor, computer hardware and software.</p> <p>2. transferred skills for the basic teaching methods by long-term and short-term experts, but applied teaching methods are not yet fully transferred .</p> <p>3. Introduced practices by utilizing equipment based on the curriculum,and made the teaching and learning materials and revised these materials every year.</p> <p>4. Transferred skills for developing the syllabus and curriculum by long-term experts.</p> <p>5. Finished selecting and developing materials of each subject, some materials developed by personal computers, and owned jointly as a part of database of materials by using network system.</p> <table border="1"> <tr> <td>Day time Training</td> <td>Assigned 6 counterparts in electronic section. (graduates 2001:18trainees)</td> </tr> <tr> <td>Upgrading Training</td> <td>Conducted upgrading training courses according to needs of private sector and government. Trainees increase in Electronics section continuously. Developed upgrading training courses (1999: 2courses, 2000: 2 courses, 2001: 11 courses) (attended 101 trainees from 1999 to Oct 2001)</td> </tr> <tr> <td>Evening Class</td> <td>The number of trainee is increasing by carrying out basic training(day time) (graduates until 2001:19trainees)</td> </tr> </table>	Day time Training	Assigned 6 counterparts in electronic section. (graduates 2001:18trainees)	Upgrading Training	Conducted upgrading training courses according to needs of private sector and government. Trainees increase in Electronics section continuously. Developed upgrading training courses (1999: 2courses, 2000: 2 courses, 2001: 11 courses) (attended 101 trainees from 1999 to Oct 2001)	Evening Class	The number of trainee is increasing by carrying out basic training(day time) (graduates until 2001:19trainees)		
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1. INPUT	<p>Japan side 1. Longterm Expert : Mr.Kazuaki Sato, Mr.Masahiro Fujita 2. Shortterm Expert : Mr.Hirotatsu Hayashi 3. Counterpart Training : Ms.Asiimwe L (3 in JAPAN)</p> <p>Uganda side 1. Counterpart : Mr.A.Sembatya (Assigned 13 Instructors: 7 out of 13 transferred or resigned)</p>																
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1. INPUT	<p>Japan side</p> <ol style="list-style-type: none"> 1. Longterm Expert : Mr.Masao Nozawa, Mr. Shigekatsu Suzuki 2. Shortterm Expert : none 3. Counterpart Training : Mr.j. Katungole, Mr.Bukiwa H (5 in JAPAN , 2 in 3rd COUNTRY) <p>Uganda side</p> <ol style="list-style-type: none"> 1. Counterpart : j. Katungole (Assignment 9 instructors) ; 4 out of 9 transferred and resigned. 																										
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Evening Class	<p>The number of student is increasing by carrying out basic training.(day time)</p> <p>(graduate 2000:13trainees 2001:7trainees)</p> <p>(as of 30th.Oct.2001 1st :19trainees , 2nd:18trainees , 3rd:none)</p>																										



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1. INPUT	<p>Japan side 1. Longterm Expert : Mr. Toshio Takeno , Mr.Katsuo Sasaki 2. Shortterm Expert : none 3. Counterpart Training :Mr.Asimwe.P (6 in JAPAN)</p> <p>Uganda side 1. Counterpart :Mr.Asimwe.P (Assigned 12 instructors) ; 5 out of 12 transferred and resigned.</p>																										
2. ACTIVITY	<table border="1"> <tr> <td>Basic training (Day time)</td> <td>Basic training (Day time) course started in 1998.</td> </tr> <tr> <td>Training Target</td> <td>Trainees with minimum o' level qualification .</td> </tr> <tr> <td>Training Subject</td> <td>Total of 2-year training system. (Theory 25% Practice 75%) This training has 2 semesters per year. 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Training of 1st and 2nd trainees in basic training worked in closer cooperation with income activities.</td> </tr> <tr> <td>Upgrading Training</td> <td>Upgrading Training course started in 1999.</td> </tr> <tr> <td>Training Target</td> <td>workers of industries</td> </tr> <tr> <td>Training Subject</td> <td>Developed the order and ready-made and tailor-made training courses suitable for the various trainig needs from enterprises and governmental organization, etc.,</td> </tr> <tr> <td>Technology Transfer</td> <td>Improved counterparts and trainee's skills for developing the upgrading training courses (order-made and ready-made training courses ,etc.) based on transferred skills and technology to make curriculum from japanese expert.(e.g. ability for setting up courses ,planning upgrading training).</td> </tr> <tr> <td>Basic training (Evening Class)</td> <td>Basic training (Evening Class) course started in 1998.</td> </tr> <tr> <td>Training Target</td> <td>Trainees with minimum o' level qualification .</td> </tr> <tr> <td>Training Subject</td> <td>Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training (day time).</td> </tr> <tr> <td>Technology Transfer</td> <td>Transferred skills and technology is as same as Basic training (day time) .</td> </tr> <tr> <td>Developing Training Materials & Curriculum</td> <td>Revised the curruculum & syllabus in 2001 and developed training materials for all subjects that need to get the certificate of crafts-man. Also NAKAWA VTI has the committee for investigating carruculum and syllabus. For motor vehicle section , syllabas and curriculum were changed to have advanced technology system of engine & AT. Developed training materials for business management by cooperating to UNIDO .</td> </tr> </table>	Basic training (Day time)	Basic training (Day time) course started in 1998.	Training Target	Trainees with minimum o' level qualification .	Training Subject	Total of 2-year training system. (Theory 25% Practice 75%) This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year.(Electrical Engineering, Measuring ,Engine Work 1,etc.)2ndyear (Internal Combustion Engine 2, Chasis 2, Electrical Application , etc.)	Technology Transfer	Improved counterpart skills for managing of motor vehicle section, maintenace of equipments, how to get knowledge,making of texts and training materials,teaching method, revising of curruculum and syllabus Co-owned jointly a part of dataes of materials by using network sysytem. Training of 1st and 2nd trainees in basic training worked in closer cooperation with income activities.	Upgrading Training	Upgrading Training course started in 1999.	Training Target	workers of industries	Training Subject	Developed the order and ready-made and tailor-made training courses suitable for the various trainig needs from enterprises and governmental organization, etc.,	Technology Transfer	Improved counterparts and trainee's skills for developing the upgrading training courses (order-made and ready-made training courses ,etc.) based on transferred skills and technology to make curriculum from japanese expert.(e.g. ability for setting up courses ,planning upgrading training).	Basic training (Evening Class)	Basic training (Evening Class) course started in 1998.	Training Target	Trainees with minimum o' level qualification .	Training Subject	Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training (day time).	Technology Transfer	Transferred skills and technology is as same as Basic training (day time) .	Developing Training Materials & Curriculum	Revised the curruculum & syllabus in 2001 and developed training materials for all subjects that need to get the certificate of crafts-man. Also NAKAWA VTI has the committee for investigating carruculum and syllabus. For motor vehicle section , syllabas and curriculum were changed to have advanced technology system of engine & AT. Developed training materials for business management by cooperating to UNIDO .
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Technology Transfer	Transferred skills and technology is as same as Basic training (day time) .																										
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3. Outcome	<table border="1"> <tr> <td>Day time Training</td> <td>GOOD</td> </tr> <tr> <td>Achievement Situation & Problem, etc.</td> <td>Finished to make texts and materials based on curriculum for all subjects except a part of Electronic Fuel Injection system of engine and Automatic transmission in motor vehicle section . Assigned 7 instructor in motor vehicle section,and established the management of the section. Upgrading of the skills of these subjects and revision of EFI is necessary. Since advanced technology transfer is very important in industries in uganda.</td> </tr> <tr> <td>Upgrading Training</td> <td>VERY GOOD</td> </tr> <tr> <td>Achievement Situation & Problem, etc.</td> <td>Developed texts of counterparts and trainees for upgrade training courses . Revision of curruculum & syllabus is necessary according to change of the advanced technology in enterprise.</td> </tr> <tr> <td>Evening Class</td> <td></td> </tr> <tr> <td>Achievement Situation & Problem, etc.</td> <td>Improve trainees' skills for teaching method,making texts and training materials for Basic training.</td> </tr> </table>	Day time Training	GOOD	Achievement Situation & Problem, etc.	Finished to make texts and materials based on curriculum for all subjects except a part of Electronic Fuel Injection system of engine and Automatic transmission in motor vehicle section . Assigned 7 instructor in motor vehicle section,and established the management of the section. Upgrading of the skills of these subjects and revision of EFI is necessary. Since advanced technology transfer is very important in industries in uganda.	Upgrading Training	VERY GOOD	Achievement Situation & Problem, etc.	Developed texts of counterparts and trainees for upgrade training courses . Revision of curruculum & syllabus is necessary according to change of the advanced technology in enterprise.	Evening Class		Achievement Situation & Problem, etc.	Improve trainees' skills for teaching method,making texts and training materials for Basic training.														
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Evening Class																											
Achievement Situation & Problem, etc.	Improve trainees' skills for teaching method,making texts and training materials for Basic training.																										
4. Implement of Project Purpose	<p>1. Almost finished to transfer and skills for selecting and installing machins and equipments,and maitaining machines and equipments except EFI engine system & AT .</p> <p>2. Transferred skills for the basic teaching methods by long- term experts and short-term experts.but the applied theaching methods skills and technology is not yet fully transferred.</p> <p>3. Introduced practices by Utilizing machines based on the carriculum, and almost made the teaching and learning materials and revising these materials every year.</p> <p>4. Transferred skills for developing the syllabus and curriculum by long-term experts.</p> <p>5. Finished selecting materials of each subject, making the materials ,moreover ,making various materials by personal computer, and then owned jointly a part of dataes of materials by using network system.</p> <table border="1"> <tr> <td>Day time Training</td> <td>Assigned 7 counterparts in motor vehicle section. (graduate 2000: 21trainees 2001: 19trainees)</td> </tr> <tr> <td>Upgrading Training</td> <td>Conducted upgrading training courses in motor vehicle section. And it is important to meet the needs of industries and governmental organization, etc. Developed upgrading training courses (1999:11 courses, 2000:5 courses, 2001:4 courses) (attended 201 trainees from 1999 to 30th.Oct.2001)</td> </tr> <tr> <td>Evening Class</td> <td>Improved skills and techology of counterparts for carrying out basical training precisely.(day time (graduate 2000:10 Trainees,2001:20 trainees) (present in 30th.Oct. 2001 1st :20 trainees , 2nd:42 trainees, 3rd: none)</td> </tr> </table>	Day time Training	Assigned 7 counterparts in motor vehicle section. (graduate 2000: 21trainees 2001: 19trainees)	Upgrading Training	Conducted upgrading training courses in motor vehicle section. And it is important to meet the needs of industries and governmental organization, etc. Developed upgrading training courses (1999:11 courses, 2000:5 courses, 2001:4 courses) (attended 201 trainees from 1999 to 30th.Oct.2001)	Evening Class	Improved skills and techology of counterparts for carrying out basical training precisely.(day time (graduate 2000:10 Trainees,2001:20 trainees) (present in 30th.Oct. 2001 1st :20 trainees , 2nd:42 trainees, 3rd: none)																				
Day time Training	Assigned 7 counterparts in motor vehicle section. (graduate 2000: 21trainees 2001: 19trainees)																										
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(Signature)

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Uganda NAKAWA Vocational Training Institute
Achievement of the plan for each section

SECTION : Woodworking

31st,Oct,2001

1. INPUT		<p>Japan side</p> <p>1. Longterm Expert : Mr. Toshihiko Yamakawa, Mr.Toshinori Horai</p> <p>2. Shortterm Expert : Mr. Junji Kubota (paint)</p> <p>3. Counterpart Training : Mr. Mugisha H (4 in JAPAN)</p> <p>Uganda side</p> <p>1. Counterpart : Mr. Mugisha H (Assigned 11instructors: 4 out of 11 resigned)</p>
2. ACTIVITY		
Basic training (Day time)	Training Target	Day time Training course started in 1999. Trainees with minimum o' level qualification .
Subject		Total of 2-year training system. (Theory 25% Practice 75%). This training has 2 semesters per year. Subjects of both basic and applied theory and practices. 1st year(Woodwork material, Woodwork processing, Drawing,etc.) 2nd year (Finish coating, Method of furniture production etc.)
Technology Transfer		Improve counterpart's skills for managing of Woodworking section, maintenance of equipment,making of texts and training materials,teaching methods, revising of curriculum and syllabus . Training of 1st and 2nd trainees in basic training in closer cooperation with income activities.
Upgrading Training	Training Target	Upgrading Training course started in 1999.
Training Contents		Established for workers of industries.
Technology Transfer		Ready-made and tailor-made training courses according to the various training needs from industries. Improve counterpart's skills for developing upgrading training courses.
Basic training (Evening Class)	Training Target	Evening Class started in 1999.(Close this class from 2000 until this year.)
Subject		Trainees with minimum o' level qualification .
Technology Transfer		Total of two and half years training system.This training has minimum subjects and training hours Skills and technology transferred in connection with Basic training(day time) .
Developing Training Materials & Curriculum		Develop and revise the curriculum & syllabus for all subjects which include nessesary subjects for the certificate of craftsman. NAKAWA VTI has the committee for curriculum and syllabus. In case of woodworking section , developing training materials by using personal computer. When it was the first half of this project, four instructors resigned . So, it is nessesary to transfer the woodworking technology to another instructor. Developed training materials for business management by Cooperating to UNIDO
3. Outcome		
Day time Training		GOOD
Achievement Situation & Problem, etc.		Finished to making texts and materials for all subjects except Corner Locking machine. Dovetail machine, Press machine, Super Surfacar in woodworking section. Assigned 7 instructors and be prepared to manage this section. Upgrading of the skills of these subject is necessary. Since advanced technology transfer is very important industries in Uganda.
Upgrading Training		GOOD
Achievement Situation & Problem, etc.		Developed 6 upgrading training courses during 3 years and made training materials for that courses Various upgrading training courses and training materials suitable for industrial needs should be developed, since there is a lot of needs for Woodworking machine operation in Uganda.
Evening Class		
Achievement & Problem, etc.		Improve counterpart's skills for teaching method,and developed texts and training materials suitable for Basic training(day time).
4. Implementation of Project Purpose		<p>1. Technology of some subjects concerning operating equipment will be transferred until the end of project. It is difficult to finish to transfer skill about the subject of Corner Locking machine. Dovetail machine, Press machine, Super Surfacar.</p> <p>2. Transferred skills for the basic teaching methods by long-term and short-term experts, but applied teaching methods are not yet fully transferred .</p> <p>3. Introduced practices by utilizing equipment based on the curriculum,and made the teaching and learning materials and revised these materials every year.</p> <p>4. Transferred skills for developing the syllabus and curriculum by long-term experts.</p> <p>5. Finished selecting and developing materials of each subject, some materials developed by personal computers, and owned jointly as a part of database of materials by using network system.</p>
Day time Training		Assigned 7 counterparts in woodworking section. (graduates 2001: 7trainees)
Upgrading Training		Conducted upgrading training courses according to needs of private sector and government. It was constantly hold upgrading training ever year. Developed upgrading training courses (1999: 1course, 2000: 4 courses, 2001: 1 course) (attended 41 trainees from 1999 to Oct 2001)
Evening Class		The number of trainee is increasing by carrying out basic training.(day time)

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Uganda NAKAWA Vocational Training Institute
Achievement of the plan for each section

SECTION : Sheet metal

31th.Oct.2001

1. INPUT		<p>Japan side</p> <p>1. Longterm Expert : Mr.Mr.Hirotake Iida 2. Shortterm Expert :Mr. Yoshimitsu Higa (Pipe processing) 3. Counterpart Training :Mr.Muwanga G Fred (4 in JAPAN)</p> <p>Uganda side</p> <p>1. Counterpart :Mr.Muwanga G Fred (Assigned 9 instructors) : 2 out of 9 transferred.</p>
2. ACTIVITY		
Basic training (Day time)	Training Target	Day time Training started in 1999. Trainees with minimum o' level qualification .
Training Subject	Technology Transfer	Total of 2-year training system..(Theory 25% Practice 75%) This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year.(Engineering Drawing, Materials, Measurements, Hand Finishing and Machinning,etc.)2ndyear (Applied Welding, Automotive Body Repair,Painting and Finishing, Sheet Metal Developing , etc.) Improve counterpart's skills for managing of sheet metal section, maintenace of equipment, making of texts and training materials,teaching method,revising of carruculum and syllabus . Training of 1st and 2nd trainee in basic training in close cooperation with income activities.
Upgrading Training	Training Target	Upgrading Training course started in 1998. Workers of industries .
Training Subject	Technology Transfer	Developed the ready-made and tailor-made training courses in the field of sheet metal and plumbing to meet various training needs for required enterprises and governmental organization. Improve skills for developing the upgrading training courses (ready-made training courses ,etc.) .
Basic training (Evening Class)	Training Target	Basic training (Evening Class) course started in 1999. Trainees with minimum o' level qualification .
Training Subject	Technology Transfer	Total of two and half years training system.This training has minimum subjects and training hours . Transferred skills and technology as same as Basic training(day time) .
Developing Training Materials & Curriculum		Developed and revised the carruculum & syllabus and developed training materials based on ILO texts, O VTA texts for all subjects that need to get the certificate of crafts-man. Also NAKAWA VTI has the committee for investigating carruculum and syllabus. For sheet metal section , training materials for tools and equipments were developed .
3. Outcome		
Day time Training	Achievement Situation & Problem, etc.	VERY GOOD Finished to make texts and materials based on ILO texts and ,OVTA texts except on a Automobile body repairing and painting finishing and pipe processing. . Dispatched 7 instructor in sheet metal section,and established the management the section. Technology transfer of pipe processing and paiting &finishing , automobile body repairing, pipe processing is not yet fully accomplished . Uupgrading skills of all subjects is necessary . Co-owned jointly a part of datas of materials by using network sysytem.
Upgrading Training	Achievement Situation & Problem, etc.	VERY GOOD Developed trainees' texts for upgrading training courses . Production of carruculum & syllabus is necessary for advanced technology in industry..
Evening Class	Achievement Situation & Problem, etc.	Improved counterpart's skills for teaching method,and developed texts and training materials for Basic training (day time) .
4. Implement of Project Purpose		<p>1. Almost finished to transfer skills for selecting and installing equipments,and maitaining equipment except on paiting &finishing , automobile body repairing and pipe processing.</p> <p>2. Transferred skills for the basic teaching methods by long- term experts and short-term experts.but the applied teaching methods is not yet fully transferred .</p> <p>3. Introduced practices by utrizng equipments based on the carriculum. And almost made the teaching and learning materials and revised these materials every year.</p> <p>4. Transferred abilities for developing the syllabus and curriculum by long-term experts.</p> <p>5. Finished selecting materials of each subject, making the materials ,some of them by using personal computer and then owned jointly as a part of datas of materials by using network sysytem.</p>
Day time Training		Asigned 7 couterparts in sheet metal section. (graduate 2001:12trainees)
Upgrading Training		Conducted upgrading training courses in sheet metal and pipe processing fields. And the number of increased to develop the upgrading training courses. Developed upgrade training courses (1998:1course, 1999:4 courses, 2000:7courses, 2001:1course) (attended 56 trainees from 1998 to 30th.Oct.2001)
Evening Class		The number of student is increasing by carrying out basic training.(day time training) (graduate 3trainees)Xas of 30th.Oct.2001 1st :15trainees , 2nd:21trainees, 3rd:none)



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1. INPUT	<p>Japan side</p> <p>1. Longterm Expert : Mr.Tetsu Goto, Mr.Toshio Maki 2. Shortterm Expert : Mr.Junji Kubota (Painting) 3. Counterpart Training : Mr.Wanyama Ignation (4 in JAPAN, 5 in 3rd country)</p> <p>Uganda side</p> <p>1. Counterpart : Mr.Namiisi Saimon (Assignment 9 instructors) : 3 out of 9 transferred</p>
2. ACTIVITY	
Basic training (Day time)	Basic Training(day time)course started in 1998.
Training Target	Trainees with minimum o' level qualification .
Training Subject	Total of 2-year training system. (Theory 25% Practice 75%) This training has 2 semesters per year. Subjects of both basic and applied theory and practice. 1st year.(Mechanical Engineering, Teaching Drawing, Basic Measurement Practice,etc.)2nd year (, TIG and MIG Welding, Applied Pracrice Study , etc.)
Technology Transfer	Improved couterpart skills for managing of welding section, maintenace of equipments, how to get knowledge of each subject,making of texts and training materials,teaching method, revising of Trained for 1st and 2nd studens in basic training worked in closer cooperation with income activities.
Upgrading Training	Upgrading Training Course started in 1998.
Training Target	Mainly established for workers of an industry for required skills.
Training Subject	Developed the ready-made and tailor-made training courses suitable for the various training needs from enterprises and governmental organization, etc..
Technology Transfer	Improved trainee skills for developing the upgrade training cources (ready-made training cources ,etc.)
Basic training (Evening Class)	Basic Training(Evening Class) course started in 1999.
Training Target	Students with minimum o' level qualification .
Training Subject	Total of two and half years training system.This training has minimum subjects and training hours comparing to Basic training(day time).
Technology Transfer	Skills and technology transfered in connection with Basic training (day time) .
Developing Training Materials & Curriculum	Developed and revised the carruculum & syllabus and developed training materials based on ILO texts, OVTA texts for all subjects that need to get the certificate of crafts-man. Also NAKAWA VTI For sheet metal section , training materials for tools and equipments were developed. Developed training materials for business management by cooperating to UNIDO .
3. Outcome	
Day time Training	VERY GOOD
Achievement Situation & Problem, etc.	Finished to make texts and materials based on ILO texts and ,OVTA texts in welding fields. Dispatched 6 instructors in welding section,established the management the section. Technology transfer is very well achieved considering the uganda industry's situation. Upgrading of ths skills of these subjects is necessary.
Upgrading Training	VERY GOOD
Achievement Situation & Problem, etc.	Developed counterpart's texts for upgrading training courses. Rivision of carruculum & syllabus is necessary for advanced technology in industry .
Evening Class	
Achievement Situation & Problem, etc.	Improved counterpart's skills for teaching method,making texts and training materials suitable for Basic training(day time) .
4. Implement of Project Purpose	<p>1. Almost finished to transfer abilities and skills for selecting and installing equipments.and maitaining equipments.</p> <p>2. Transfered skills for the basic teaching methods by long-term experts and short-term experts.but the applied teaching methods is not yet fully transfered .</p> <p>3. Introduced practices by utilizing equipment based on the curriculum, and almost made the teaching and learning materials and revising these materials every year.</p> <p>4. Transfered skills for developing the syllabus and curriculum by long-term experts.</p> <p>5. Finished selecting materials of each subject, and produced the training materials ,some of them by using personal computer and then co-owned jointly as a part of datas of materials by using network</p>
Day time Training	Assigned 6 couterparts in welding section. (graduates 2000: 17trainees 2001:19trainees)
Upgrading Training	Conducted upgrading training courses in welding fields. And increased the number of the upgrading training courses. Developed upgrade training courses (1998:1course, 1999:4 courses, 2000:7 courses, 2001: 1 course) (attended 40 trainees from 1998 to 30th.Oct. 2001)
Evening Class	The number of trainees is increasing by carrying out basical training.(day time training) (graduates 4 trainees)(as of 30th.Oct.2001 1st :15trainees , 2nd:21trainees, 3rd:none)

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Performance of teaching & learning materialsPerformance of teaching & learning materials

Section	Plan	Achieved	%
Electronics	1,212	546	45.0
Electricity	776	630	81.2
Machinery	18	18	100.0
Auto vehicle	1,089	589	54.1
Woodworking	1,246	356	28.6
Sheet metal	748	444	59.4
Welding	1,440	1,421	98.7
Total	6,529	4,004	61.3

Performance of teaching materials produced

Section	No.	Items
Electronics	1	Circuit
Electricity	2	Soldeng Sample
	3	Circuit
Machinery	4	Test pieces
Auto vehicle	5	Cut model - EFI engine
	6	Cut model - Ordinary engine
	7	Cut model - AT transmission
	8	Rely board
	9	Sample - Alternator
	10	Diesel Engine pump pristroke major device
	11	Bulb spring remover
	12	Sand blasting equipment
Woodworking	13	Sample - Joint(several)
	14	Sample - box
	15	Sample - door
Sheet metal	16	Sample - drawer
	17	Sample - tools
	18	Sample - trays
	19	Sample - wrench
Welding	20	Sample - Bottle opener
	21	Sample - rubbish collector
	22	Sample - Round table
	23	Sample - Caster
	24	Sample - Steel door
	25	Sample - Window

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Performance of trainees

(persons)

Course	Section	1998				1999				2000				2001				合計			
		Apply	Entol	Resign	Graduate	Apply	Entol	Resign	Graduate	Apply	Entol	Resign	Graduate	Apply	Entol	Resign	Graduate	Apply	Entol	Resign	Graduate
Day time	Electronics	0	0	0	0	69	18	0	18	78	21			80	18			227	57	0	18
	Electricity	31	20	2	18	61	18	0	18	56	21			82	18			230	77	2	36
	Machinery	22	20	3	17	41	18	0	18	30	21			37	18			130	77	3	35
	Automotive	43	21	0	21	61	20	1	19	62	21			95	18			261	80	1	40
	Woodwork	0	0	0	0	9	8	4	4	18	18			20	17			47	43	4	4
	Sheet Metal	0	0	0	0	20	17	5	12	38	21			49	18			107	56	5	12
	Welding	22	18	1	17	22	19	0	19	23	20			22	18			89	75	1	36
	Total	118	79	6	73	283	118	10	108	305	143			385	125			1091	465	16	181
Part time	Electronics	0	0			38	33	14	19	41	41			34	20			113	94	14	19
	Electricity	18	16	4	12	39	37	14	23	39	39			35	20			131	112	18	35
	Machinery	16	10	3	7	21	19	6	13	18	18			20	19			75	66	9	20
	Automotive	16	12	2	10	35	28	8	20	42	42			41	20			134	102	10	30
	Woodwork	0	0			1	0			5	5			10	9			16	14	0	0
	Sheet Metal	0	0			6	6	3	3	21	21			24	15			51	42	3	3
	Welding	0	0			6	6	2	4	10	10			20	15			36	31	2	4
	Total	50	38	9	29	146	129	47	82	176	176			184	118			556	461	56	111
Total	Electronics	0	0	0	0	107	51	14	37	119	62	0	0	114	38	0	0	340	151	14	37
	Electricity	49	36	6	30	100	55	14	41	95	60	0	0	117	38	0	0	361	189	20	71
	Machinery	38	30	6	24	62	37	6	31	48	39	0	0	57	37	0	0	205	143	12	55
	Automotive	59	33	2	31	96	48	9	39	104	63	0	0	136	38	0	0	395	182	11	70
	Woodwork	0	0	0	0	10	8	4	4	23	23	0	0	30	26	0	0	63	57	4	4
	Sheet Metal	0	0	0	0	26	23	8	15	59	42	0	0	73	33	0	0	158	98	8	15
	Welding	22	18	1	17	28	25	2	23	33	30	0	0	42	33	0	0	125	106	3	40
	Total	168	117	15	102	429	247	57	190	481	319	0	0	569	243	0	0	1647	926	72	292

The result of Trade Test (Year 2000)

CENTRE	DATE	F/M			C/J			E/I			MVM			W/F			PPF			TOTAL			% Pass
		T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	
Ave Maria VTC, Lira	2000/11/20				21	14	7													21	14	7	66.7
Bbira (LAYE)	2000/10/16				11	7	4													11	7	4	63.6
Daniel Comboni-Gulu	2000/1/24				8	5	3				7	7	0							15	12	3	80.0
Dinno VTC, Masindi	2000/7/10				1	1	0				15	8	7							16	9	7	56.3
Don Bosco VTC, Bombo	2000/10/23				5	3	2									10	6	4		15	9	6	60.0
Kumi VTI, Kumi	2000/7/24										5	0	5							5	0	5	0
Kyamulibwa VTC, Masaka					3	3	0													3	3	0	100
Lugogo VTI, Lugogo	2000/5/22	11	8	3	18	13	5	52	46	6	48	27	21	27	18	9	45	36	9	201	148	53	73.6
Nakawa VTI, Nakawa	2000/2/28	17	15	2				18	15	3	21	18	3	17	14	3				73	62	11	84.9
Ogweno's VT - Lira	2000/1/27										8	5	3	2	2	0				10	7	3	70.0
Pioneer VTI, Iganga	2000/10/10							4	4	0	20	16	4	2	2	0				26	22	4	84.6
St Simon Peter, Hoima	2000/6/12				6	6	0				10	10	0							16	16	0	100
St. Bruno VTC, Mbarara	2000/11/13				10	10	0													10	10	0	100
VTI, Jinja	2000/7/31	5	5	0	5	5	0	13	13	0	16	14	2	6	4	2	12	9	3	57	50	7	87.7
VTI, Nakawa	2000/6/5							11	11	0	6	6	0							17	17	0	100
Zzeziwe VTI, Mulago	2000/10/23										8	6	2							8	6	2	75.0

Key

F/M: Fitting & Machining

C/J: Carpentry & Joinery

W/F: Welding & Fabrication

PPF: Plumbing & Pipe Fitting

E/I: Electrical Installation

MVM: Motorvehicle Mechanics

T: Total

P: Pass

F: Fail

RESULTS OF TRADE TEST (YEAR 2001)

CENTRE	DATE	F/M			C/J			T			E/I			MVM			W/F			PPF			TOTAL			% Pass						
		T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F							
Dinno VTC, Masindi	2001/7/11																									7	0	7	0.0			
Church army African Mbale	2001/7/23				13	9	4																						13	9	4	69.2
Nakawa VTI	2001/3/26	18	13	5	7	5	2	17	12	5	18	17	1	18	16	2	17	14	3	12	7	5	107	84	23				107	84	23	78.5
St Simon Peter, Hoima	2001/6/11				6	6	0																						11	6	5	54.5

Key

F/M: Fitting and Machining

C/J: Carpentry & Joinery

E/I: Electrical Installation

T: Electronics

MVM: Motorvehicle Mechanics

W/F: Welding & Fabrication

PPF: Plumbing & Pipe Fitting

T: Total

P: Pass

F: Fail

The result of UNEB

CENTRE	DATE	F/M			C/J			E/I			MVM			W/F			PPF			E/N			TOTAL			% Pass
		T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	T	P	F	
Lugogo VTI, Lugogo	June/July	8	7	1	20	12	8	60	42	17	59	13	40				47	20	25				194	94	91	48.5
Nakawa VTI, Nakawa	June/July	15	9	6				28	16	12	14	4	10							39	15	24	96	44	52	45.8
VTI, Jinja	June/July	4	2	2	7	5	2	26	12	14	27	5	22				21	5	16				85	29	56	34.1

Key

F/M: Fitting & Machining
 C/J : Carpentry & Joinery

W/F: Welding & Fabrication
 PPF: Plumbing & Pipe Fitting
 E/N : Electronics

E/I : Electrical Installation
 MVM: Motorvehicle Mechanics
 T: Total
 P: Pass

F: Fail

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ANNEX 6.3 (1/2)

Performance of Graduates

Graduates of March 2000

Section	Graduates	May 2000 Survey	August 2001 Survey						
			Authority	Private	Self-employee	Subtotal	Upper Educatio	Unknown	Un-decided
Electronics						0			
Electricity	18	17	2	11	3	16	2	0	0
Machinery	17	11	0	10	0	10	0	4	3
Automotive	21	13	5	6	1	12	0	9	0
Woodwork						0			
Metalsheet						0			
Welding	17	12	1	8	1	10	1	3	3
Total	73	53	8	35	5	48	3	16	6
%	100.0	72.6	11.0	47.9	6.8	65.8	4.1	21.9	8.2

Graduates of March 2001

Section	Graduates	Private	Self-employee	Sutotal	Upper Educatio	Unknown	Un-decided
Electronics	18	4	5	9	3	1	5
Electricity	18	10	1	11	1	0	6
Machinery	18	11	2	13	0	3	2
Automotive	19	4	0	4	0	0	15
Woodwork	4	2	2	4	0	0	0
Metalsheet	12	3	4	7	0	0	5
Welding	19	7	0	7	1	1	10
Total	108	41	14	55	5	5	43
%	100.0	38.0	13.0	50.9	4.6	4.6	39.8

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ANNEX 6.3 (2/2)

Performance of graduates – Company list

Year	March-00				March-01			
Section	Company	Q'ty	No.	Section	Company	Q'ty	No.	
Electricity	K.M.Engineering	1	1	Electronic	Lonrho Motors	1	1	
	Roofings Uganda Ltd	1	2		Monitor FS/Publisher	2	2	
	Hwan Sung (U) Ltd	1	3		Dehezi International	1	3	
	Celtel Uganda	1	4		Subtotal	4		
	Uganda Meat Industries	1	5	Electricity	Adtranz(U)Nalukolongo	3	4	
	Electrowatt	1	6		Thermo Cool (U) Ltd.	1	5	
	Lentech (U) Ltd.	1	7		Shimuku (U) Ltd. Soroti	1	6	
	Thermo Cool (U) Ltd.	2	8		Castel(U) Ltd	1	7	
	Knight Electrical Co	1	9		General Mouldings (U) Ltd	1	8	
	Medipharm (U) Ltd.	1	10		Electrowatt (U) Ltd	1	9	
Subtotal	11		Soul-Lugazi		1	10		
Machinery	Pioneer Eng. Works	2	11		Toroo Packers Ltd	1	11	
	St. Michael Technical Services	1	12		Multiple Engineering Ltd	1	12	
	Kinyara Sugar Works	1	13		Subtotal	11		
	Biyinzike Enterprises Ltd.	2	14	Machinery	Roofings Uganda Ltd.	3	13	
	Rwenzori Beverage Co. Ltd.	1	15		Century Bottling Co.	1	14	
	Roofings Uganda Ltd	1	16		Pioneer Eng. Works	1	15	
	Kanpala Pharmaceuticals Industries	1	17		H.J.S. Engineering Works Ltd.	1	16	
	Wood Machinery (U) Ltd.	1	18		John Lugendo and Company	1	17	
Subtotal	10		Otto Engineering Co.		1	18		
Automotiv	Cooperation and Dev. For Uganda	1	19		Uganda Breweries	1	19	
	United Engineering Servies	1	20		Cres form (U) Ltd.	1	20	
	Gapco (U) Ltd.	1	21	Subtotal	10			
	Victoria Motors	1	22	Automotive	Victoria Motors – Kampala	2	21	
Nakibizzi Motor Garage	1	24	US Embassy– Kampala		1	22		
Namuwongo Petrol Station	1	25	Wandegeya Kampala		1	23		
Subtotal	6		Subtotal	4				
Welding	Casement Uganda Ltd.	1	26	Woodwork	Church of Uganda Sooti	1	24	
	Electrowatt	1	27		Jumbo Furniture Makers	1	25	
	Uganda Brewry Ltd.	1	28		Gaba TTC	1	26	
	House of Sea Food	1	29		Subtotal	3		
	Roko Construction	1	30	Sheetmeta	Thermal Cool	1	27	
	CSI Uganda Ltd.	2	31		Drillco Contractors	1	28	
	New Nebem Enterprise Ltd.	1	32		Multech Technical Services	1	29	
Subtotal	8		Subtotal	3				
Total	Total	35		Welding	Roko Construction Co.	1	30	
					Mukwano Industries	1	31	
					Otto Ineriors	1	32	
					M.K.Electrowatt	1	33	
					Lags Construction	1	34	
					Kireka Workshop	1	35	
					Scoul-Lugazi	1	36	
					David Engineering	1	37	
					Subtotal	8		
					Total	43		

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Courses and trainees

Section	No.	Period	Weeks	Name of Course	Content of Course	Target or Company	Number of Trainees
Electronics	1	99.03.01 ~ 04.09	6.0	Radio and TV Maintenance and Repair	* Radio fault finding and repair * Circuit interpretation * Circuit diagram interpretation * TV fault finding and repair	For those who are interested in servicing and repair of TV and also upgrade their skills practically	1
	2	99.10.01 ~ 11.09	6.0	Radio and TV Maintenance and Repair	* Radio fault finding and repair * Circuit interpretation * Circuit diagram interpretation * TV fault finding and repair	For those who are interested in servicing and repair of TV and also upgrade their skills practically	2
	3	00.03.13 ~ 03.17	1.0	Public Address System	*Introduction to semi conductors *Amplifiers *PA installation *Troubleshooting and Repair of Electronics equipment	Hoima Diocese	1
	4	00.08.14 ~ 10.06	4.0	UNIDO-MCP Technical skills upgrading	*Hand tools *Electronics components *Radio system *TV system B/W *TV system coloured *Trouble shooting / repair of Electronics equipment	UNIDO - MCP	3
	5	01.02.19 ~ 02.23	1.0	Computer System	*Introduction to computer application / use *Microft Word and Excel for beginners *Ms Power Point	Heads of institutions, Managers of companies Workshop supervisors, foremen, managers of NGOs, Industrialist, Owners of medium and small scale enterprises etc	20
	6	01.03.19 ~ 03.23	1.0	TV system	*Component identification *B/W TV fault finding / Repair *Coloured TV fault finding / Repair *Circuit diagram interpretation	USAID- Technicain / Electrician	2
	7	01.07.23 ~ 07.03	2.0	Computer System	*Upgrading and Repair of PCs *Applications	Evening class pioneer trainees of Electronics sections	12
	8	01.09.17 ~ 09.28	2.0	Computer System	*Introduction to computer application / use *Microft Word and Excel for beginners	Police Officers	12
	9	01.10.01 ~ 10.05	1.0	Computer System	*Introduction to computer application / use *Microft Word and Excel for beginners	Individuals	9
	10	01.10.08 and 10.10	0.4	Computer System	*Introduction to Internet / E-mail *Web Browsing	Individuals	8
	11	01.09.24 ~ 02.02.15	15.0	Electronics general	*Analogue & Digital Electronics	Nile Breweries	1
		subtotal	39.4				71
Electricity	1	98.07.03 ~ 08	4.0	Motor Rewinding	*Practical Skills Involved in Motor Rewinding	EUROPEAN UNION TEA ESTATES	4
	2	98.10.05 ~ 11,	6.0	Electrical Installation and Fitting	*BASICS OF INDUSTRIAL WIRING *DIAGNOSING RECTIFYING ELECTRICAL FAULTS	U.E.B.- PRIVATE INTERPRENEURS	5
	3	99.05.08 ~ 06.08	4.0	Servicing Domestic Appliances and Electrical Installation	*BASICS OF CAUSES OF FAULTS IN DOMESTIC APPLIANCES *THEIR WIRING CIRCUITS	LOCAL ELECTRICIANS FROM KAMPALA CITY.	4

	4	99.08.02 ~ 10.01	4.0	Motor Rewinding	*ACQUIRE SKILLS IN SINGLE & THREE PHASE MOTOR REWINDING. PROBLEM SOLVING IN GENERATORS, ARMATURES & TRANSFORMERS	U.E.B. (OWEN FALLS DAM)	6
	5	00.02.04 ~ 03.04	4.0	Electrical Installation and Fitting	*SKILLS INVOLVED IN BOTH DOMESTIC AND INDUSTRIAL WIRING. *FAULT FINDING SYSTEMS.	KAKIRA SUGAR FACTORY. EUROPEAN UNION TEA ESTATES	5
	6	00.05.06 ~ 06.08	4.0	Motor Rewinding	*THREE PHASE, GENERATOR & TRANSFORMER REWINDING SKILLS *MAINTENANCE	EUROPEAN UNION TEA ESTATES. PRIVATE INTERPRENEURS	4
	7	00.08.10 ~ 09.20	6.0	Electrical Engineering	*ATTAIN MODERN SKILLS, IN REWINDING INDUSTRIAL SAFETY *MAINTENANCE OF MACHINES & AUTOMATION	UNIDO	13
	8	00.11.03 ~ 12.05	4.0	Motor Rewinding	*SKILLS IN MOTOR REWINDING	ADTRANZ NAIUKOLONGO AND ADRA-KIREKA	4
	9	01.02.20 ~ 03.16	4.0	Refrigeration & Air Conditioning	*PRACTICAL APPROACHES TO REFRIGERATION *AIR CONDITIONING- CHOICE OF TOOLS *INSTRUMENTS IN SOLVING REFRIGERATION PROBLEMS	CENTURY BOTTLING CO. - GREENFIELD FISHERIES ENTEBBE - IKALEIVORTH FARMERS SOROTI	6
	10	01.04.09 ~ 05.02	4.0	Programmable Logic Control (PLC)	*CONCEPTS OF PLC IN MODERN AUTOMATED INDUSTRIAL SYSTEMS	B.A.T.	4
	11	01.07.23 ~ 08.14	4.0	Motor Rewinding	*ATTAIN SKILLS IN MOTOR REWINDING	SPENCON (U) LTD	2
	12	01.06.18 ~ 09.07	12.0	Programmable Logic Control (PLC)	*CONCEPTS OF PLC IN MODERN AUTOMATED INDUSTRIAL SYSTEMS	NILE BREWERIES LTD.	1
		subtotal	60.0				58
Machinery	1	12/10 ~ 20/11/98	6.0	Metal machining and Machinery Maintenance	*Interpretation of Drawings *Lathe work *Gear milling *Maintenance	Roko Construction Steel corporation	2
	2	11/01 ~ 20/02/99	6.0	Metal Machining, Bench Fitting and Machinery Maintenance	*Interpretation of Drawings *Bench work *Lathe work *Milling	Rwenzori Vocational Training Centre Pan Kajansi bricks and tiles works	2
	3	01/03 ~ 24/03/99	3.0	Metal machining and Machinery Maintenance	*Interpretation of drawings *Materials indentifications *Maintenance	Kinyara Sugar Works	1
	4	01/03 ~ 24/03/99	4.0	Metal machining and Machinery Maintenance	*Precision turning *Meturlugy *Drawing	Roko Construction Ltd	1
	5	21/6 ~ 30/7/99	6.0	Metal machining and Machinery Maintenance	*Lathe work *Milling *Gear milling *Interpretation of Drawing *Meturlugy	Luwero Industries	2
	6	23/8 ~ 1/10/99	6.0	Metal Machining, Bench Fitting and Machinery Maintenance	*Lathe work *Milling *Gear milling *Interpretation of Drawing	Uganda Clays Ltd	1
	7	17/01 ~ 15/02/00	4.0	Metal machining and Fitting	*Precision Turning *Gear milling	Kinyara Sugar Works	1

	8	08/05 ~ 14/05/00	1.0	Bench fitting, Drilling & Shaping	*Drilling *Shaping *Bench fitting	Crown Beverages Ltd.	1
	9	12/06 ~ 16/06/00	1.0	Metal Machining	*Lathe work	Rwenzori Highland (Kito tea estate)	1
	10	14/09 ~ 25/08/00	2.0	Bench fitting, Drilling & Shaping	*Drilling *Shaping *Bench fitting	Rwenzori Highland (Kito tea estate)	1
	11	11/09 ~ 15/09/00	1.0	Metal Machining & Fitting	*Lath work		1
	12	18/09 ~ 29/09/00	1.0	Lathe Turning	*Basic Lathe work	UNIDO	21
	13	18/09 ~ 29/09/00	3.0	Lathe Turning	*Lath work	Mulago Hospital	11
	14	10/10 ~ 4/11/00	3.5	Agro processing equipment Manufacturing	*Manufacturing and servicing of Agro-processing equipment	Sasagawa 2000	7
	15	16/04 ~ 25/05/01	6.0	Metal Machining	*Lathe work *Milling	Self sponsor	1
	16	18/06 ~ 21/09/01	12.0	Metal Machining, Fitting &	*Lathe work *Material identification and testing *shaping *milling *maintenance	Nile Breweries	2
		subtotal	65.5				56
Vehicle	1	99/1/18 ~ 1/29	2.0	Driver light maintenance	*Pre operation check	Public	2
	2	99/1/18 ~ 1/26	1.0	Automotive preventive maintenance	*Car maintenance	Public	2
	3	99/3/15 ~ 4/23	6.0	Automotive preventive maintenance	*Car maintenance	Public	4
	4	99/6/28 ~ 7/9	2.0	Driver light maintenance	*Pre operation check	UNICEF	15
	5	99/7/19 ~ 7/30	2.0	Driver light maintenance	*Pre operation check	UNICEF	11
	6	99/8/2 ~ 8/13	2.0	Driver light maintenance	*Pre operation check	UNICEF	13
	7	99/8/16 ~ 8/27	2.0	Driver light maintenance	*Pre operation check	UNICEF	11
	8	99/8/23 ~ 10/10	7.0	Automotive preventive maintenance	*Car maintenance	Public	1
	9	99/8/30 ~ 9/10	2.0	Driver light maintenance	*Pre operation check	UNICEF	20
	10	99/9/13 ~ 9/24	2.0	Driver light maintenance	*Pre operation check	UNICEF	14
	11	99/10/25 ~ 12/3	6.0	Car electric maintenance	*EFI engine maintenance	Public	4
	12	00/1/17 ~ 1/28	2.0	Car electric maintenance	*Car electric system maintenance	Public	10
	13	2000/8/14 ~ 21	1.0	EFI	*EFI engine maintenance	Public	8
	14	2000/8/21 ~ 28	1.0	Diesel engine maintenance	*Diesel engine maintenance	Public	7
	15	2000/10/23 ~ 11/10	3.0	Cooling system maintenance	*Radiator repair maintenance	Kakira Sugar Co.Ltd	5
	16	2000/12/2 ~ 2001/1/7	2.0	Driver maintenance	*Car maintenance	Uganda government authority	45
	17	2001/8/5 ~ 17	2.0	Automotive preventive maintenance	*Car maintenance	Police department	9
	18	2001/7/30 ~ 8/17	2.0	EFI	*EFI engine maintenance	Entebe Airport service	2
	19	2001/9/14 ~ 27	2.0	Car electric maintenance	*Car maintenance and repair	Public	2
	20	2001/9/17 ~ 28	2.0	Automotive preventive maintenance	*Car maintenance	Police department	16
		subtotal	51.0				201
Woodworking	1	99.8.10 ~ 8.24	2.0	Furniture coating	*Poly Urethane transparency coating for Mahogany	Kakira Sugar Co.Ltd	10
	2	00.7.10 ~ 8.15	5.0	Furniture production	*Drawing, Furniture production	Kakira Sugar Co.Ltd	4
	3	00.8.14 ~ 9.22	5.5	Upholstery, Furniture production	*Frame construction, *Platform padding, *Dressing & Finishing	UNIDO	22

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	4	00.10.10~11.17	5.5	Furniture production	*Drawing, Furniture production	Kakira Sugar Co.Ltd	2
	5	00.10.10~11.4	3.5	Agro-processing equipment Manufacturing	*Manufacturing and servicing of Agro-processing equipment	Sasakawa Global - 2000	2
	6	01.7.23~8.3	2.0	Operation of woodworking machinery	*Construction and functions of woodworking machines *Safety in relation to woodworking machines *Effective and productive use of woodworking machines and equipment	USAID	1
		subtotal	23.5				41
Sheet Metal	1	1998/9/8 - 1998/10/16	6.0	S/01/98/UP	*Insallation and repair of domestic appliances	Momai Management Apach Tech. School	2
	2	1999/1/11 - 1999/2/29	6.0	S/01/99/UP	*Domestic plumbing	Gravity fall scheme	1
	3	1999/9/20 - 1999/10/29	6.0	S/07/99/UP	*Installation of domestic ppliances	Hoima Diocese Uganda clays	2
	4	1999/6/14 - 1999/7/23	5.0	S/03/99/UP	*Sheet metal development	Luwero Industries	1
	5	1999/7/26 - 1999/9/3	6.0	S/06/99/UP	*General plumbing	Hoima Diocese Mwenge estate Kisoro water project	3
	6	2000/9/11 - 2000/9/15	1.0	S/13/00/UP	*Emergency repairs	Rwenzori Highlands LTD.	1
	7	2000/9/18 - 2000/9/29	1.0	Tailor Made	*Measurements and marking	MOH Mulago	11
	8	2000/11/6 - 2000/12/1	3.0	S/15/00/UP	*Emergency repairs of plumbing system	Rwenzori Highlands LTD.	1
	9	2000/10/10 - 2000/11/17	3.0	S/13/00/UP	*Installation of appliances and roof work	Kakira sugar works	2
	10	2000/10/30 - 2000/11/3	1.0	Tailor Made	*Sheet metal development	Masuulita VTC	7
	11	2000/8/28 - 2000/9/6	2.0	Master Craft Program	*Marking bending and forming	UNIDO	21
	12	2000/10/10 - 2000/11/4	4.0	Sheet Metal Processing	*Sheet metal development	Sasakawa Global - 2000	3
	13	2001/8/21 - 2001/9/7	3.0	S/02/01/UP	*Installation of appliances and plumbing bye laws	Hoima Diocese	1
		subtotal	47.0				56
Welding	1	1998/6/21-1998/7/21	4.0	Upgrading	*Covered Arc Welding	Government Officer	1
	2	2000/8/14 - 2000/9/29	3.0	Master Craftsmen Training	*Fabrication and Designing , Quality Control	UNIDO	18
	3	2000/9/18 - 2000/9/29	2.0	Covered Arc welding , Gas Welding and Sheetmetal Training	*Covered arc welding, Making an Artificial leg	M.O.H Mulago	11
	4	2000/10/10 - 2000/11/3	4.0	Agro-processing equipment	*Manufacturing and servicing of Agro-processing equipment	Sasagawa 2000	3
	5	2000/10/16 - 2000/10/27	2.0	Upgrading	*MIG,TIG	Rwenzori Highlands LTD.	2
	6	2000/10/16 - 2000/10/28	2.0	Upgrading	*MIG,TIG	Century Bott. Company	1
	7	2001/6/18 - 2001/8/10	8.0	Artisan / Apprentice course (4 groupes)	*Gas Welding , Brazing , Covered Arc Welding * MAG Welding , MIG Welding , TIG Welding	Nile brewery	1
	8	2001/7/30 - 2001/8/10	2.0	Covered arc welding	*Covered arc welding. Interpretation of welding.Drawing	Kayonza tea growers/USAID	3
		subtotal	27.0				40
86		Total	313.4				523.0



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Uganda Nakawa Vocation Training Institute Project

Up grading training – List of Companies

Section	Course	Trainee	Hours	Major client
Electronics	11	71	39.4	Public Hoima Diocese UNIDO NGO Nile Breweries Police department
Electricity	12	58	60.0	European Union Tea Estate UEB Private Interpreneures Kakira Sugar Factory Adtranz Century bottling.Co British & American Tabacco Spencon UNIDO Greenfield fisheries Ikaleivorth farmers
Machinery	16	56	65.5	Roko Construction Steel Co Rwenzori Vocation Training center Pan Kajjansi bricks and tiles workss Kinyara Sugar Works Crown beverages Ltd. Luwero Industries Rwenzori Highland Mulago Hospital UNIDO
Motor Vehice	20	201	51.0	UNICEF Governmente authorities Police department Airport authority Kakira sugar Co., Ltd. Public
Woodworking	6	41	23.5	Kakira Sugar Co., Ltd UNIDO USAID Sasagawa Global 2000
Sheet Metal	13	56	47.0	Momai management MOH Mulago Uganda clay Rwenzori Highlands Ltd. Apach Tech. School Gravity fall scheme Hoima Diocese Mwenge estate Kisoro water project Masuulita VTC UNIDO Sasagawa Global 2000
Welding	8	40	27.0	Government authorities MOH Mulago Century Bott. Co. Nile brewery Kayonza tea growers UNIDO Sasagawa Global 2000
Total	86	523	313.4	

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Seminar Performance

Date	Name of Seminar	Duration	Type	No of Participants	Use of Institute equipment	Resource persons	Budget	Remarks
14th -26th Sept, 1998	TransAfrican Management Institute	2 weeks	Management	25	Conference room, Accomodation & meals	TAMI staff	1,206,000/=	
5th,6th,12th,13th,June, 1998	Foundation for International Community Assistance Uganda	4 days	Management	75	Conference room & meals	FINCA Staff	2,585,000/=	
22nd -26th Feb, 1999	PROTS Instructors seminars	1 week	Training of Trainers (External & Internal)	30	Conference room, OHP and prepared PROTS materials	JICA Expert & Nakawa VTI staff	2,370,000/=	
July/August, 1999	PROTS Instructors seminars	1 week	Training of Trainers (Internal)	41	-- do --	JICA Expert & Nakawa VTI staff		
1st Nov, 1999-22nd Jan, 2000	-- do --	-- do --	Training of Trainers (Internal & External)	67	Conference room OHP and prepared PROTS Materials	-- do --		
17th -21st Jan, 2000	PROTS Course C1 & C2	1 week	Training of Trainers (Internal)	11	Conference room OHP and prepared PROTS Materials	JICA Expert & Nakawa VTI staff		
24th - 28th Jan, 2000	PROTS Instructors seminars	1 week	Training of Trainers (External)	27	-- do --	-- do --	3,452,500/=	
21st & 22nd Feb, 2000	Six and four set material Presentation	4 days	Training of Trainers (Internal)	38	-- do --	CTA, JICA Experts, 2 Instructors	NIL	
25th-29th April, 2000	UNIDO	1 week	UIP, MCP Programme	29	Conference room & accomodation	UNIDO, USSIA	3,178,000/=	
8th-12th May, 2000	-- do --	-- do --	-- do --	39	-- do --	-- do --	3,977,500/=	
29th May - 2nd June, 2000	-- do --	-- do --	-- do --	20	-- do --	-- do --	2,300,000/=	
19th - 23rd June, 2000	-- do --	-- do --	-- do --	20	-- do --	-- do --	1,400,000/=	
26th - 30 June, 2000	-- do --	-- do --	-- do --	6	-- do --	-- do --	920,000/=	
2rd - 8th July, 2000	UNIDO	1 week	UIP, MCP Programme	7	Conference room & accomodation	UNIDO, USSIA	1,060,500/=	

Date	Name of Seminar	Duration	Type	No of Participants	Use of Institute equipment	Resource persons	Budget	Remarks
10th - 14th July, 2000	-- do --	-- do --	-- do --	12	-- do --	-- do --	1,600,000/=	
31st July - 4th Aug, 2000	PROTS A, B1 & B2	1 week	Training of Trainers (Internal)	12	Conference room, OHP & prepared PROTS materials	Nakawa VTI staff, CTA and 2 JICA Experts	NIL	
4th, 16th, 18th, Aug, 2000	Ministry of Finance & Economic Planning	3 days	Budget Control		Conference room & meals	Ministry of Finance & Economic Planning Officials		
22nd, 25th, & 29th Aug, 2000	-- do --	-- do --	Budget Control		-- do --	-- do --		
29th Sept, 2000	Ministry of Education & Sports	1 day	Education Policy		-- do --	Ministry of Education & Sports		
1st - 7th Oct, 2000	UNIDO	1 week	UIP Programme	39	Conference room & accomodation	UNIDO, USSIA	4,426,500/=	
8th - 14th Oct, 2000	-- do --	-- do --	-- do --	37	-- do --	-- do --	4,199,500/=	
15th - 21st Oct, 2000	-- do --	-- do --	-- do --	36	-- do --	-- do --	3,884,000/=	
2nd - 5th Jan, 2001	Computer Seminar	1 week	Training of Trainers (Computer skills)	9	Computer room	Nakawa VTI staff	NIL	
11th - 18th Jan, 2001	PROTS A, B1 & B2	1 week	Training of Trainers (Internal)	39	Conference room, OHP and prepared PROTS materials	Nakawa VTI staff, CTA and 2 JICA Experts	3,638,500/=	
21st - 26th Jan, 2001	-- do --	-- do --	-- do --	34	-- do --	-- do --	3,005,000/=	
28th Jan - 3rd Feb, 2001	-- do --	-- do --	-- do --	40	-- do --	-- do --	4,327,500/=	
19th - 23rd Feb, 2001	Computer Seminar	1 week	Industrialists	12	Computer room	Nakawa VTI staff		
26th Feb - 2nd March, 2001	PROTS	1 week	Training of Trainers (External)	21	Conference room, OHP and Prepared PROTS materials	Nakawa VTI staff		
24th - 25th April, 2001	Senior Staff Lugogo	2 days	Semester System of Training	12	Conference room and Meals	Nakawa VTI staff		

Performance of income generating activities

(U Shilling)

Month	Income of each Section									Annual total
	Admini.	Electronics	Electricity	Machinery	Automotive	Woodwork	Sheetmetal	Welding	Total	
Aug-01	0	10,800	0	454,000	150,000	100,000	387,000	993,500	2,095,300	
Jul-01	0	70,000	110,000	151,000	479,800	268,000	576,500	532,500	2,187,800	
Jun-01	0	41,000	135,000	1,192,700	720,000	210,000	332,000	1,025,000	3,655,700	
May-01	0	79,000	25,000	265,000	408,000	80,000	506,000	1,562,500	2,925,500	
Apr-01	0	0	0	230,000	560,000	470,000	237,000	440,500	1,937,500	
Mar-01	0	85,000	0	1,485,000	1,334,000	25,000	434,000	331,300	3,694,300	
Feb-01	0	35,000	0	1,757,000	1,594,000	138,000	355,000	514,500	4,393,500	
Jan-01	0	0	880,000	1,887,000	625,000	35,000	403,500	326,000	4,156,500	25,046,100
Dec-00	0	30,000	1,579,760	1,192,500	505,000	40,000	788,000	1,497,500	5,632,760	
Nov-00	700,000	255,000	281,840	1,630,000	4,500,000	2,074,650	453,000	2,384,500	12,278,990	
Oct-00	666,800	105,000	171,600	1,070,000	1,058,000	148,800	224,000	105,000	3,547,200	
Sep-00	872,000	180,000	238,880	2,490,500	1,630,000	214,500	729,700	1,423,300	7,778,880	
Aug-00	258,400	180,000	238,880	1,290,000	772,000	318,130	565,800	1,754,000	5,377,010	
Jul-00	309,000	53,000	969,000	2,370,000	689,000	0	358,900	2,791,650	7,540,550	
Jun-00	294,000	170,000	140,400	1,246,000	1,301,000	0	591,500	2,167,500	5,910,400	
May-00	452,000	60,000	853,200	3,796,000	1,235,000	381,300	3,340,000	1,098,400	11,215,900	
Apr-00	352,800	5,000	0	140,000	386,000	0	265,000	150,000	1,298,800	
Mar-00	0	0	0	370,000	270,000	509,000	754,500	2,617,425	4,520,925	
Feb-00	0	165,000	300,000	2,626,000	235,000	45,000	305,000	1,205,500	4,881,500	
Jan-00	0	100,000	0	1,020,000	637,000	230,000	395,000	1,593,600	3,975,600	73,958,515
Dec-99	300,000	0	0	1,589,000	175,000	1,450,000	382,000	571,600	4,467,600	
Nov-99	60,000	5,000	0	984,000	984,000	0	227,000	1,585,000	3,845,000	
Oct-99	33,680	0	60,000	280,000	235,500	0	676,000	1,731,800	3,016,980	
Sep-99	200,000	0	52,000	219,800	299,000	0	117,000	904,500	1,792,300	
Aug-99	300,000	67,000	165,000	583,000	175,000	0	343,000	2,216,800	3,849,800	
Jul-99	60,000	68,000	260,000	476,500	518,000	0	539,000	1,357,400	3,278,900	
Jun-99	2,093,600	90,000	360,000	90,000	70,000	0	209,000	1,316,650	4,229,250	
May-99	1,472,300	30,000	245,000	529,000	155,000	0	347,000	1,072,000	3,850,300	
Apr-99	1,368,400	55,000	528,600	250,000	618,000	0	276,300	617,000	3,713,300	
Mar-99	1,836,500	17,000	770,000	430,000	178,000	0	194,000	443,650	3,869,150	
Feb-99	487,000	78,000	321,000	1,005,000	275,000	0	191,400	472,600	2,830,000	
Jan-99	322,000	172,000	325,000	270,000	170,000	0	218,000	159,650	1,636,650	40,379,230
Dec-98	500,000	75,000	337,000	192,000	170,000	0	191,200	650,400	2,115,600	
Nov-98	0	35,000	337,000	854,400	130,000	0	183,000	271,950	1,811,350	
Oct-98	0	161,000	5,000	337,000	224,000	0	816,000	120,000	1,663,000	5,589,950
Total	12,938,480	2,476,800	9,689,160	34,752,400	23,463,300	6,737,380	16,911,100	38,005,175	144,973,795	144,973,795

ANNEX 9.2

List of Clients

Income Generating Activities

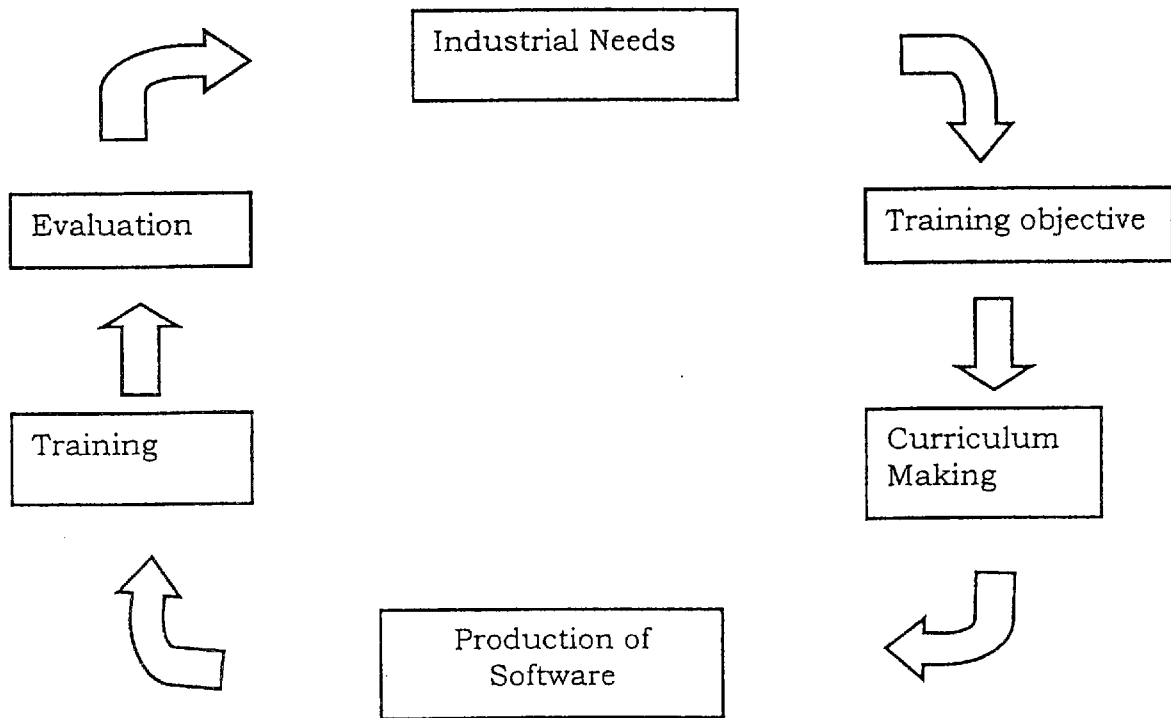
Section	No.	Name of Company	Section	No.	Name of Company
Electricity	1	House of Pavement (U) Ltd.	Welding	1	Britania
	2	Kassam's Automobile Engineering Ltd.		2	Hwan Sung
	3	G.M.Tumpenco		3	Steel works Co
	4	Ugacof Ltd.		4	Mukawano Industries
	5	Anik Industries Ltd		5	Masoline
	6	Mr. Sobetra		6	Knight Engineering
	7	Reco Industries Ltd.		7	Nikom System Ltd
	8	Muddu-Awulira Enterprises Ltd.		8	Kampala Pavings
	9	China Nanjing Ltd.		9	Roko Construction
	10	OLAM (U) Ltd.		10	Zibuku Constructicon
	11	Lira Millers Ltd		11	Solar Energy
	12	Thermocool Ltd		12	Shell Ugtanda Ltd
	13	Makerere University Main Library		13	Concorp
	14	Makerere University Estates department		14	A.K.Transport
	15	Multiple Industries Ltd.		15	Quality Engineers
	16	Unilever (U) Ltd.		16	B.C.R.Company
	17	Monitor Publication Ltd.		17	Pinoneer Construction
	18	President's Office		18	Arua Auto Services
	19	Concrete Masters		19	China Jiangshu
	20	Dairy Corporation		20	M.K.Electowatt
	21	LMZ Global Ltd.		21	Arab Contractors
Machinery	1	Adraa (U) Ltd		22	Interior Constructicon
	2	Ugachick poultry feeds		23	Muddu Awauhira Enterprise
	3	Monitor Publications		24	Total Ugatnda Ltd.
	4	Uganda clays Ltd			
	5	Kakira sugar works			
	6	Drillcon			
	7	H.J.S Engineering works			
	8	Nice House of Plastics			
	9	Phenix			
	10	Roofings (U) Ltd			
	11	National Water and Sewage Corporation			
	12	Unilever			
Motor Vehicle	1	Japanese Embassy			
	2	Police Department			
	3	Ministry of Education and Sports			
	4	Spare Motors			
	5	Japanese Association in Uganda			
	6	Enteve Airport Authority			
	7	Uganda Travel Company			
Woodworking	1	JICA JOCV office in Uganda			
	2	Japanese Embassy			
Sheet metal	1	Decons Engineering and Construction Co			
	2	Bultrust Engineering and Construction Co			
	3	China Nanjing International			
	4	China Jiefang			
	5	Mira Invetment			
	6	Standard Signs			
	7	Coronation (U) Ltd			
	8	Uganda Fish Packers			
	9	Nile Ply			
	10	Concorp			
	11	Pinoneer Construction			
	12	Steel works Co			
	13	H.L.Invetments			
	14	Multiplex Engineering Co.			
	15	Roko Construction			
	16	Dott Services			
	17	Century Bottling Co.			
	18	Fire Masters			

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THE 6 COMMITTEES

1. THE PURPOSE OF COMMITTEES

The effectiveness of training is measured by the following cycle:



First of all, research for Industrial needs is made as overall target to secure the practical skill and knowledge in use, which is followed by set-up of Training Objective, based on the research.

Applicable curriculum and training software (textbook, Audio visual aid and so on) is produced as a result, and actual training is conducted.

Evaluation of Training is carried out at the end of the whole process, which is led to the beginning of the cycle of having research to find out the new Industrial linked training needs.

If there is any change or progress (development) in the needs of Industry, it will be reflected in the following Training objective to restructure a new cycle.

The role of the committee is to maintain the continuity of this cycle in order to catch up with the progress of technology and skill. It is needless to say that the purpose of committees is to make the Institute self-sustainable.

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2. COMMITTEE ORGANIZATION SYSTEM TABLE

ROLE	UGANDAN SIDE	JAPANESE SIDE
MAIN	H.O.S	EXPERT
CHAIRMAN	D/PRINCIPAL	
PARTICIPANTS	H.O.S TRAINING MANAGER BURSAR	
OBSERVER	PRINCIPAL	CTA

3. PLANNING OF SUMMONING OF A MEETING

Either the Principal or the H.O.S urges the Chairman to have a meeting.

4. FORMULATION OF AGENDA

- 4.1 H.O.S. discusses with Expert and prepares the Draft of the Agenda of Discussion.
- 4.2 H.O.S. briefs the PRINCIPAL AND CHAIRMAN on the Draft of the Agenda.
- 4.3 EXPERT briefs the CTA and EXPERTS on the Draft of Agenda.
- 4.4 H.O.S distributes the Draft of Agenda to all participants, prior to the committee meeting.
- 4.5 H.O.S EXPERT, CHAIRMAN and the COMMITTEE OBSERVES must share a common understanding of Agenda prior to summoning of the committee meeting.
This task is the responsibility of H.O.S and EXPERT.
- 4.6 CHAIRMAN chooses a clerk among the participants prior to the committee meeting.



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5. THE PROCEDURE OF THE MEETING.

- 5.1 H.O.S, EXPERT, and other participants occupy the front bench.
- 5.2 The observers occupy the rear bench.
- 5.3 THE CHAIRMAN presides over the agenda of the meeting while in session
- 5.4 THE CHAIRMAN makes important decisions on the subject matter, informs the committee members of the new developments and changes to implemented.
- 5.5 The clerk minutes the details of the agenda of the committee meeting. He/She must provide copies of the minutes as discussed, to all the members of the committee as soon as possible, not exceeding a period of one week.

6 IMPLEMENTATION OF DECISIONS

- 6.1 All H.O.S.s present the result of the discussion to section staff in the section meeting.
- 6.2 EXPERT presents the result of discussion to other EXPERTS in the weekly meeting
- 6.3 All the decisions made by the committee must be implemented forthwith without further delay, unless the H.O.S. and EXPERT views it necessary.
- 6.4 All Members of the COMMITTEE are obliged to monitor whether or not all the decisions made by committee meeting are implemented.

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NAKAWA VOCATIONAL TRAINING INSTITUTE THE 6 COMMITTEES

NO.	NAME OF COMMITTEE	COUNTER-PART	EXPERT	OTHERS
	CHAIRMAN	MASOLO		H.O.S
1	INSTITUTE MANAGEMENT	PRINCIPAL	LEADER	TRAINING MANAGER WARDEN BURSAR
2	TRAINEE MANAGEMENT	OLWO	NOZAWA	
3	SAFETY AND HYGIENE	SEMBATYA	GOTO	
4	TRAINING MACHINERY AND EQUIPMENT	KATONGOLE	TAKENO	
5	TRAINING PROMOTION	MUWANGA	SATO	
6	OUTSIDE ACTIVITY	NAMIISI	YAMAKAWA	

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NAME OF THE COMMITTEE MEETING AND CONTENT

Committee name, and in charge	Content of activities	Formats to be fixed, committee activity, relations with PROTS, reference materials.
<p>1. Institute Management Committee.</p>	<p>1-A1 Organisation set-up</p> <p>1-A2 Staff placement and function</p> <p>1-A3 Duty assignment and regulation.</p> <p>1-A4 Set up of budget control system.</p>	<ul style="list-style-type: none"> • Production of annual plan. • Production of diagram of the whole system of institute. • Production of diagram of staff placement. <ul style="list-style-type: none"> (1) Organisation chart (2) Training Revision • Production of restructure plan e.g. typist, Printing assistant, Receptionist to office Clerk <p>F. Seminar for method of training management. (Pedagogy Section) in response</p> <ul style="list-style-type: none"> • Principal/Deputy principal/ Head of the field/ Senior instructor/ Instructor/ assistant instructor/ technician/nursing aid typist/askari/ night watchman/ wittress/peeler/cleaner/cook/plumber/ gardener/ hostel attendant/workshop assistant/printing assistant, telephonist/receptionist/office messenger/head cook/cook and nursing officer. <ul style="list-style-type: none"> • Seminar for budget control (short term Expert and pedagogy in response) • Installation of budget control computer system. • Diagrams of annual budget/annual income/monthly income/annual expenses/details of monthly income expenses. • A list of expenses for annual training in each section. • List of expenses for monthly training in each section. • List of annual income generation activity (expenses/income) in each section • List of monthly income generation activity (expenses/income) in each section. <p>List of accumulated income per annum.</p>

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	<p>1-A5 Establishment of C/P training system abroad and with in the country.</p> <p>1-A6 Establishment and management of system of committee.</p> <p>1-A7 Establishment and management of system of income generation</p>	<ul style="list-style-type: none"> • Set up of selection system for trainees • Seminar for developing programme • Seminar for methodology of teaching training (short-term expert, pedagogy training in response) <p>C1: Basic for teaching and training C2: Developing lectures C3: Basics for developing practice C4: Developing practice of sensory motor System skills. C5: Developing practice of intellectual control System skills.</p> <p>Seminar: According to the needs</p> <ul style="list-style-type: none"> • Set up of committee system. • Set up of committee monitoring system. <ul style="list-style-type: none"> • Development, revision, execution of income generation • Set up seminar, and show room for income generation.
<p>2. Trainee Management Committee</p>	<p>1-A8 Recruitment of basic training</p> <p>1-A9 Development of Up-grading courses.</p> <p>1-A10 Establishment of trainees guidance system.</p> <p>1-A12 Set up regulations of judgement for pass marks and graduations</p> <p>2-8 Study/Practice of method on personal guidance</p>	<ul style="list-style-type: none"> • Manual for basic trainee recruitment selection and implementation. • Production of plan for basic trainee recruitment, section/implementation. <ul style="list-style-type: none"> • Production of news letter of Up-grading course in each field (PR purpose) <ul style="list-style-type: none"> • Establishment of rules/regulations of institute/dormitory, improvement and practice. • Implementation of meeting on punishment for trainees. <ul style="list-style-type: none"> • E-1: Guidance based on understanding of trainees' behaviour. • E-2: Development for guidance (short-term expert/pedagogy in response)

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<p>3. Safety/hygiene committee</p>	<p>1-A9 Set up of system of safety and hygiene management.</p> <p>2-9 Study/practice of safety and hygiene management system.</p>	<ul style="list-style-type: none"> • Establishment of selection of safety and hygiene promotion staff, and its work. • Regular inspection list/record • Safety and hygiene inspection list/record • List/record of accident analysis • List/record of measurement of operation environment. • Production of safety/hygiene text books in each field. • Set up of safety/hygiene committee for trainees • Hold seminar for safety/hygiene.
<p>4. Training Machinery/equipment management committee</p>	<p>1-B Training machinery/equipment management</p> <p>1-B1 Selection of equipment/machinery , production of specifications.</p> <p>1-B2 Inspection, installation, test running.</p> <p>1-B3 Procurement of spare parts and consumables.</p> <p>1-B4 Maintenance of machinery/facilities.</p> <p>1-B5 Set up of monitoring system Over machinery/facility.</p> <p>1-B6 Management of training materials</p> <p>1-B7 Acquisition of necessary books and other literature.</p>	<p>F4: Seminar for management of training machinery/equipment etc.</p> <ul style="list-style-type: none"> • Seminar for management of training facility etc. • F. Book for record of training machinery/equipment services. • Book for equipment maintenance record. • Procurement of suppliers, maintenance, remodelling invoice. • Machinery maintenance, list of condition of remodelling, list of plan for materials. • List of calculation of expenditure on materials/expenses. • List/report on consumables etc.

<p>5. Training Promotion Committee</p>	<p>2-1 Study/practice of method on investigation of training needs.</p> <p>2-2 study/practice of method of production and inspection on syllabus and curriculum.</p> <p>2-3 Study/practice of method on drawing up training plan.</p> <p>2-4 Study/practice of method of production of teaching and training materials</p> <p>2-5 Study/practice of method on operating machinery/equipment Instruction guidance.</p> <p>2-6 Study/practice of management of trainees equipment.</p> <p>2-7 Study/practice of method on training evaluation.</p> <p>2-10 Study/practice of promotion of industrial attachment.</p>	<p>B1: Seminar for identifying training needs and drawing up of course.</p> <ul style="list-style-type: none"> • Production, revision and practice of 3 training set. • Production, revision, practice of syllabus/curriculum. • Production, revision, practice of target of training. • List of plan for annual training. Weekly planning, material planning. • Usage of class room planning. • Time table for subject, and training hours. • Production, revision, practice of 4 training sets. • Production, revision, practice of 4 training sets. • A: Instruction skills/technical instructor's role. • F: Record of trainees' management attendance record, assistant attendance record. • Seminar for evaluation of trainees. • List of record of maintenance in each field, personal report. <p>B3: Developing training evaluation, set up of trainees standard pass mark.</p> <ul style="list-style-type: none"> • Production of manual for promotion for industrial attachment.
<p>6. Out side activity committee.</p>	<p>4-1 PR Promotions</p> <p>4-2 Liaison with federation of employers etc.</p> <p>4-3 Approach to prospective employers and collection of employment information.</p> <p>4-4 Establishment of job matching system.</p>	<ul style="list-style-type: none"> • Production of PR promotion annual plan. • Production plan of annual meeting with federation of employers. • Production of annual plan of approach to prospective industries. • Production of annual of job matching.

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Achievements

Date of assembly	Committee type	Actions, activities and recommendations	Achievements
12-04-2001	Institute Management	New guiding principals to income generating activities launched.	Intranet system installed. Improved monitoring of income generating activities realised. Customer invoice, Labour cost and the Consumer cost processed automatically by the computer access software.
12-06-2001	ditto	Evaluation of the returns from the income generating activities for the month of may, 2001.	Total realised revenue from the 7 Sections = 2,925,500.00 Shares of the net profit divided as 50% Administration and 50% reimbursed to the Sections.
12-07-2001	ditto	Evaluation of the returns from the income generating activities for the month of June 2001.	Total realised revenue from the 7 Sections = 3,590,700.00 Shares of the net profit divided as 50% Administration and 50% reimbursed to the Sections.
26-09-2001	ditto	1. Evaluation of the returns from the income generating activities for the months of July & August 2001. 2. Pedagogy department asked to prepare Instructing Staff in service training programme during the current vacation.	Total realised revenue from the 7 Sections, July = 2,228,000.00 , August = 2,174,500.00 Shares of the net profit divided as 50% Administration and 50% reimbursed to the Sections. Computer operations programme for selected staff conducted by Electronics Section.
31-01-2001	Trainee Management	Reviewed the year 2001 intake interview format and procedure of conducting the Tests and media advertisements.	Carried out successful interview exercise, marked, moderated and graded successful candidates (new intake for the year, 2001). Together with the Pedagogy section modified the Institute rules and regulations governing all trainees.
19-10-2001	ditto	Trainee Guidance Book (face) modified and uniform format authorised in all Sections.	The Trainee guidance book (face) designed and commissioned. Record of each trainee is reserved and obtainable from respective sections through the application of Access software displayed on Intranet.



Achievements Continued

Date of assembly	Committee type	Actions, activities and recommendations	Achievements
27-04-2001	Safety and Hygiene	1. Recommended prompt accident reporting, whether major or minor from all sections of the campus. 2. Resumption of the safety and sanitation check list. 3. Annual planning for observing safety and hygiene launched . The monthly safety green cross recommended to all sections.	Record of how the accident occurred to be filled in while reporting. Frame work of Safety and sanitation check lists distributed to all members. All Instructing Staff provided with safety Shoes Procured by JICA office. The green cross is yet to be implemented.
28-06-2001	ditto	1. Annual Staff safety and hygiene sensitisation development training programme unveiled. Period ranges from January to December of every year. 2. A special Safety Slogan be derived every month to activate and sustain the awareness among the Institute population. 3. A special award be put in place by the Institute management to be credited to the most outstanding section/department that meets the safety standards on periodic competitive basis.	Periodic general cleaning exercises have been carried out in all sections involving the Staff and the Trainees. Safety Patrol carried out by the Inspection team and results summarised by the Committee. Safety patrol team includes the <ul style="list-style-type: none"> - Principal - Deputy Principal - Chief Technical advisor - Expert - Head of Section The prize is yet to be secured by the Administration.
3-07-2001	Machinery and Equipment	All the previous record of Training Equipment and Tools rearranged and stored in the computer. Through the access software one can readily access the data on the Intranet.	The data is tabulated as below; <ul style="list-style-type: none"> - Administration No. - Item - Name of Machinery - Name of Manufacturer - Model - Quantity - Date of purchase - Confirmation (condition) - Date of stock - Remarks

(Signature)

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Achievements Continued

Date of assembly	Committee type	Actions, activities and recommendations	Achievements
18-12-2000	Training Promotion	Prepared the annual Training plan for the year, 2001.	With the new application of Access software the following; <ul style="list-style-type: none"> - Annual training schedule - Implementation sheet - Attendance sheet are displayed on the Intranet. Relevant data can be retrieved conveniently. Supervision of training activities greatly enhanced.
24-01-2001	Outside Activity	<ol style="list-style-type: none"> 1. Developed the new student recruitment format for Basic training (Full time and part time) programmes for the year, 2001. 2. Formed the ad-hoc committee for preparation of the graduation ceremony of the successful graduates. 3. The same ad-hoc committee entrusted with the organisation of the jubilee celebrations to mark 30 years of existence of Nakawa VTI. 4. Prepared the Institute Prospectus for the year, 2001. 5. Prepared the Institute brochure. 	<p>Media advertisement carried out successfully.</p> <p>Number of applications received were >500.</p> <p>Several meetings held and tentative Budget presented to the Principal.</p> <p>Lay out of activities of the day proposed and probable requirements listed.</p> <p>600 copies printed by the New Vision for the year, 2001. Approximately 500 copies given out including 100 copies at the trade show.</p> <p>More than 2000 copies of the brochures given out including 1000 copies at the trade show.</p>
26-09-2001	ditto	<ol style="list-style-type: none"> 1. Proposed the modalities for the Institute's participation in the annual UMA international trade show October, 2001. 2. Prepared the display materials for the show. 	<p>Trade show was very successful.</p> <p>Sections contributed the display items.</p>

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ANNEX 11

Project Evaluation Mission for Technical Cooperation on Nakawa Vocational Training Institute Project in Uganda
Evaluation Grid - Survey Result

Criteria	Survey item	Information resource	Results																						
1. Efficiency	Were the timing to dispatch the long & short-terms experts and contents of instruction appropriate ?	-Project report -Hearing from the counterpart personnel	- Total input of long & short-term experts : 519 M/M - Long-term experts of the electronics, woodwork and metal sheet sections were dispatched earlier than the arrival of the equipment and materials for vocational training in those sections. - Due to the change of technology, delay of transfer of new technology transfer, such as information technology, automatic transmission and electrical fuel injection system, was observed.																						
	How many graduates were employed by the Ugandan leading enterprises?	Project report	- Results March 2000 <table style="margin-left: 40px;"> <tr><td>Private enterprises</td><td>40</td></tr> <tr><td>Government authorities</td><td>8</td></tr> <tr><td>Higher education</td><td>3</td></tr> <tr><td>Unemployed</td><td>6</td></tr> <tr><td>Unknown</td><td>16</td></tr> <tr><td>Total</td><td>73</td></tr> </table> - Result March 2001 as of July 2001 <table style="margin-left: 40px;"> <tr><td>Private enterprises</td><td>55</td></tr> <tr><td>Higher education</td><td>5</td></tr> <tr><td>Unknown</td><td>4</td></tr> <tr><td>Pending</td><td>44</td></tr> <tr><td>Total</td><td>108</td></tr> </table> - Due to the delay of UNEB results, recruitment activity in 2001 is slow.	Private enterprises	40	Government authorities	8	Higher education	3	Unemployed	6	Unknown	16	Total	73	Private enterprises	55	Higher education	5	Unknown	4	Pending	44	Total	108
	Private enterprises	40																							
Government authorities	8																								
Higher education	3																								
Unemployed	6																								
Unknown	16																								
Total	73																								
Private enterprises	55																								
Higher education	5																								
Unknown	4																								
Pending	44																								
Total	108																								
Were the selection of counterpart personnel for training, timing of training and the contents of training appropriate ? How do they utilize the knowledge and technology learned in the training ?	-Project report - Hearing from the counterpart personnel	- The total number of counterpart personnel training, the timing of training and contents of training were appropriate. - 32 counterpart personnel out of 45, who were trained, are staying at the Institute as the counterpart personnel. - Total man month of training of counterpart personnel is 304 M/M. - The additional training was required because of the replacements of counterpart personnel of the woodworking section.																							

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<p>Were the selection of the equipment and materials and the timing to supply them appropriate ? How were they utilized ?</p>	<p>- Project report</p>	<p>- The selection and timing to supply the equipment and materials were almost appropriate. - Total value of the equipment and materials : Japanese Yen.424million. - The arrival of the equipment and materials for the electronics, wood working and sheet metal sections were delayed. The first consignment arrived in February 1999, after one year and six months from the project start date.</p>
<p>Was local execution fund used effectively ?</p>	<p>- Project report</p>	<p>- Local execution fund was utilized effectively as per the original plan.</p>
<p>When was the counterpart personnel assigned ? How much is the fixed ratio of them ?</p>	<p>- Project report</p>	<p>- Some counterpart personnel were assigned behind the schedule. - Total assignment of counterpart personnel : 50 persons (October 2000) - Frequent replacements of counterpart personnel were observed. - The assignment of major counterpart personnel of wood working section and sheet metal section was delayed. (1998 and 1999)</p>
<p>When was the assignment of administrative personnel completed ? What is the fixed ratio of them ?</p>	<p>- Nakawa VTI report</p>	<p>- The assignment of administrative personnel was completed as per the original plan. - The total number of administrative personnel : 32 persons (July 2000)</p>
<p>Was the operation budget used effectively ?</p>	<p>- Nakawa VTI report</p>	<p>- The operation budget was utilized effectively and efficiently. - In July and August 2001, the import equipment handling charge is deducted from the release of the budget, that causes the deficit of other operational budget.</p>
<p>How is the ability of counterparts to use the equipment for delivering the course ?</p>	<p>- Ability check list of trainer - Technology transfer plan to the counterpart personnel - Hearing from the counterpart personnel</p>	<p>- Technology transfer to the counterpart personnel is almost completed. - The technology level of the counterpart personnel is fair. - The technology transfer to the counterpart personnel of the electronics, woodworking and sheet metal sections was delayed due to the late arrival of equipment and materials and the replacement of counterpart personnel.</p>

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	How was the performance of training course implementation?	- Project report	<p>- Basic training <u>Electricity, Machinery, Auto vehicle and Welding sections</u> The training will be implemented for four school terms and graduate three times by May 2002. The curricula are reviewed every year and training courses are improved year by year.</p> <p><u>Electronics, Woodworking, Sheet metal section</u> By the end of the project, May 2002, three school terms will be completed and trainees will graduate twice.</p> <p>- Upgrading training Total 86 courses were conducted and 523 persons were trained. The total hours are 50,005 hours. Almost all the upgrading courses are made to meet the orders. It is needed to improve the upgrading training as the ready-made course. Enabling it, research of needs and development of curricula are necessary. The training skill for upgrading training courses should be transferred to the counterpart personnel.</p> <p>- Apprenticeship training No Apprenticeship training was implemented because there was no request by DIT.</p>
2. Effectiveness	How did the profit of income generation activities make up the operation cost deficit ?	- Nakawa VTI report	<p>- The revenue of income generation activities is distributed as per the rules decided by the Committee and makes up the deficit of operation cost of the Institute properly.</p> <p>- The amount of revenue of income generation activities is not sufficient for the current operation of the Institute.</p> <p>- The income after deduction of the consumption cost, is distributed to the operation cost(50%) and expenditure of the sections concerned (50%).</p> <p>- The income book's input to the data base can be checked by the persons in all sections, that contributes to the transparency of the activities.</p>
2	Was the data base of teaching and learning materials by intranet completed ?	-Project Report	<p>- Intranet was installed and database of teaching & learning materials are half way to be completed.</p> <p>- Revenue information of income generation activities are installed in the intranet and could be accessible by all persons-concerned.</p>

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<p>Did the counterpart personnel become independent ? How is the level of the counterpart personnel ?</p>	<p>- Technology transfer plan and progress report of the counterpart personnel.</p>	<p>- Most of the counterpart personnel learned expertise concerning training such as needs assessment, curriculum development, specialised technology, operation and maintenance of the equipment and materials, training methods, lesson plans, training management, training evaluation, trainee recruitment & selection. However, a part of counterpart personnel needs further technology transfer.</p>
<p>Did the trainee improve their knowledge level of technology ?</p>	<p>- Nakawa VTI report - Trade test results - UNEB test results</p>	<p>- The goal of trainees is to obtain the necessary technology required by the industrial enterprises and become technicians of each field, such as electronics, electricity, machinery, motor vehicle, wood working, sheet metal and welding. - Trade test results: March 2000 84.9% passed (Average of 16 institutes: 75.1%) March 2001 78.5% passed (Average of 4 institutes : 50.5%) - UNEB results March 2000 45.8% (Average 42.8%) March 2001 - not yet reported.</p>
<p>How are curricula and syllabi improved ?</p>	<p>- Project report</p>	<p>- The curricula and syllabi were improved year by year as per the needs of the enterprises. - The teaching and learning materials were developed in the Institute. - The questionnaire results shows that enterprises and organizations who requested the upgrading training were satisfied with the contents of the training.</p>
<p>How many persons applied to the basic training ?</p>	<p>- Project report</p>	<p>- Applicants for daytime basic training: 1,091 persons Enrolment; 465 persons (2.35 times) - Applicants for evening basic training: 556 persons Enrolment; 461 persons (1.21 times) -Remarks: Basically, evening course <i>accepts</i> almost all applicants..</p>
<p>How many trainees graduate from the Institute ?</p>	<p>- Project report</p>	<p>- Graduates March 2000 73 persons March 2001 108 persons Total 181 persons (91.9% of trainee graduated) - Resigned March 2000 6 persons March 2001 10 persons Total 16 persons (8.1% of trainee resigned) Graduate ration is considerably higher than the figure of same kind of institutes abroad.</p>

3. Impact	Did the number of the enterprises who requested the upgrading training increase?	Project report	- Total number of upgrading training course as of July 2001. Course 86 courses Trainee 523 persons Hour 50,006 hours - The number of enterprises who requested for the upgrading training is increasing.
	How many training courses were conducted for the trainers of other institutes?	Project report	- Total number of training courses, ie. Training methods, PROTS, Syllabi development etc. for the trainers of other institutes. Course 14 courses Trainee 393 persons
	How many joint training courses were conducted with other organizations?	Project report	- Several joint training courses were conducted, with UNIDO, Carter Fund, Sasagawa 2000.
4. Relevance	Does this project meet the policy of the Ministry of Education and Sports?	-Policy paper	-MTBF, ESIP etc.shows the new trend of Ugandan educational policy. It puts emphasis on primary education and post-primary education. Policy objectives of DIT are consistent with the project activities.
	Does this project meet the policy of Directorate of Industrial Training?	-Policy paper	-However, the position of DIT, which supervises the public Vocational Training Institute is under discussion in MOES.
	Could the private enterprises employ the graduates of the Institute ?	- Nakawa VTI report	- March 2000, 40 graduates out of 48 got their jobs were employed by the private enterprises. - March 2001, 41 graduates out of 55 got their jobs were employed by the private enterprises.
	Is this project consistent with the policy of technical assistance by Japanese government?	-Policy paper	- Human resource development is the one of the important issues of Japanese official development assistance to Uganda.
5. Sustainability	Will the national budget be allocated to this project in the future?	- Interview record with Ministry of Education and Sports	- The continuous financial support was mentioned by the Permanent Secretary in the interview. - The total Ugandan budget for education was cut off 30%. Only 3% of education budget is allocated to the vocational training sector.
	Can the revenue of income generation activities make up the budget deficit?	- Accounting record of Nakawa VTI.	- According to the accounting record of Nakawa VTI, the revenue of income generating activities could make up the budget deficit. However, because of the government budget cut off, the supplement can not depend on the activities only.

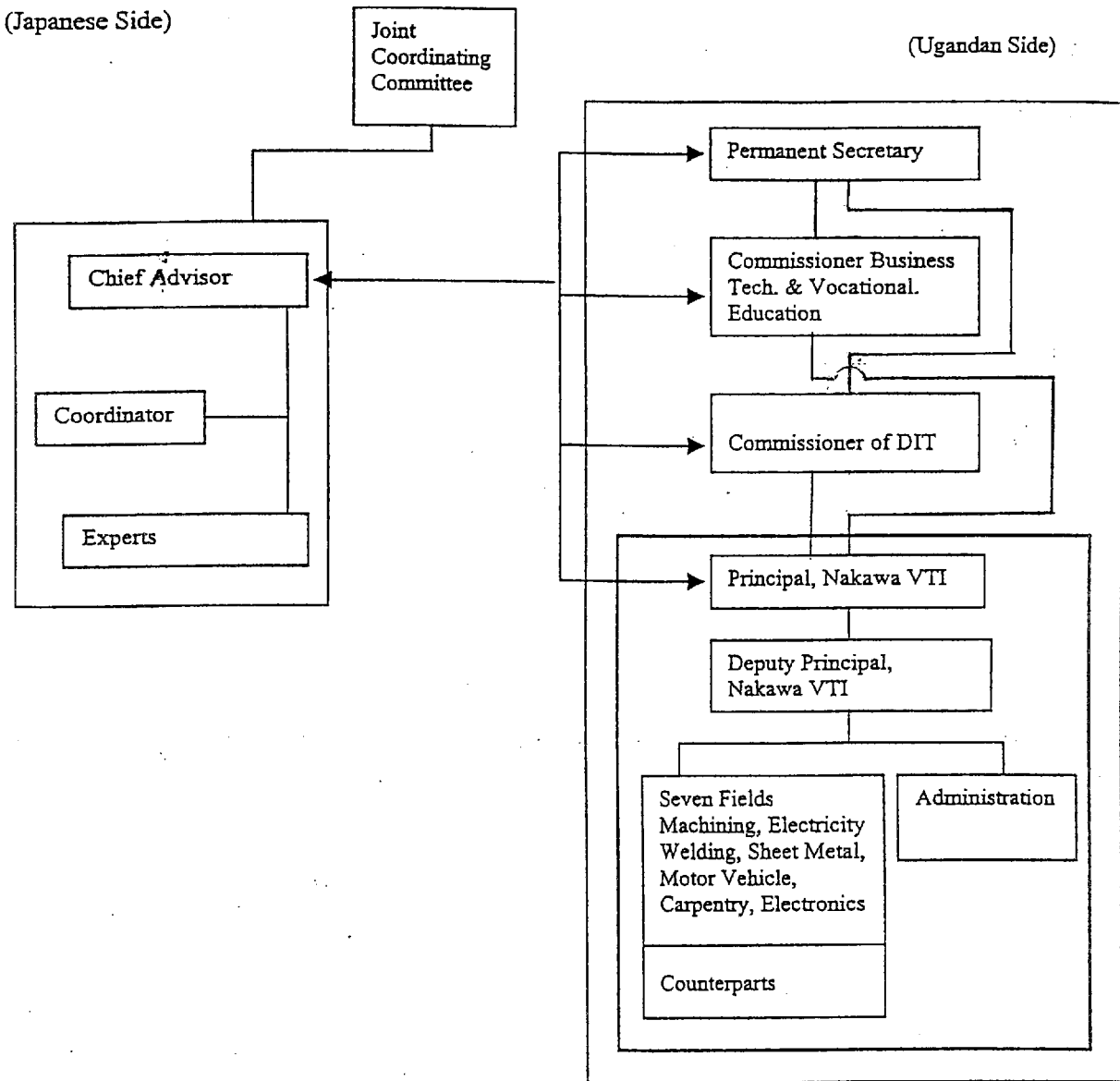
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Will the Ministry of Education and Sports continue to assign the counterpart personnel and administrative personnel in the future?	- Interview record with Ministry of Education and Sports	-MOES recruited 9 in 2000/2001 and will recruit 10 in 2001/2002, which scores 26 in 2001/2002. - MOES funded the wages and allowances of the part-time personnel in Nakawa VTI and will continue to fund it.
Will the counterpart personnel continue to work in the Institute?	- Interview record with the Pricipal of the Institute	- Only 32 out of 45 counterpart personnel who received the training abroad are working in the Institute. (71.1%) - Only 16 out of 50 counterpart personnel of the Institute are the permanent employees of the government. The balance is the part timers.
Does the Institute have the sufficient fund for the operation and maintnace of the facilities, equipment & materials and consumables?	- Interview record with the Pricipal of the Institute	- Although the income generation activities were conducted, the amount of the fund and budget was not sufficient enough to maintain the facility, equipment, materials and payment for the consumables without the release of the government budget.
Can the couterpart personnel of each section access the common data base of the Institute?	- Interview record with the Pricipal of the Institute	- In terms of the intranet installed this year, every authorised personnel can access to the data base now, and also share the information.

ORGANISATION CHART OF THE PROJECT



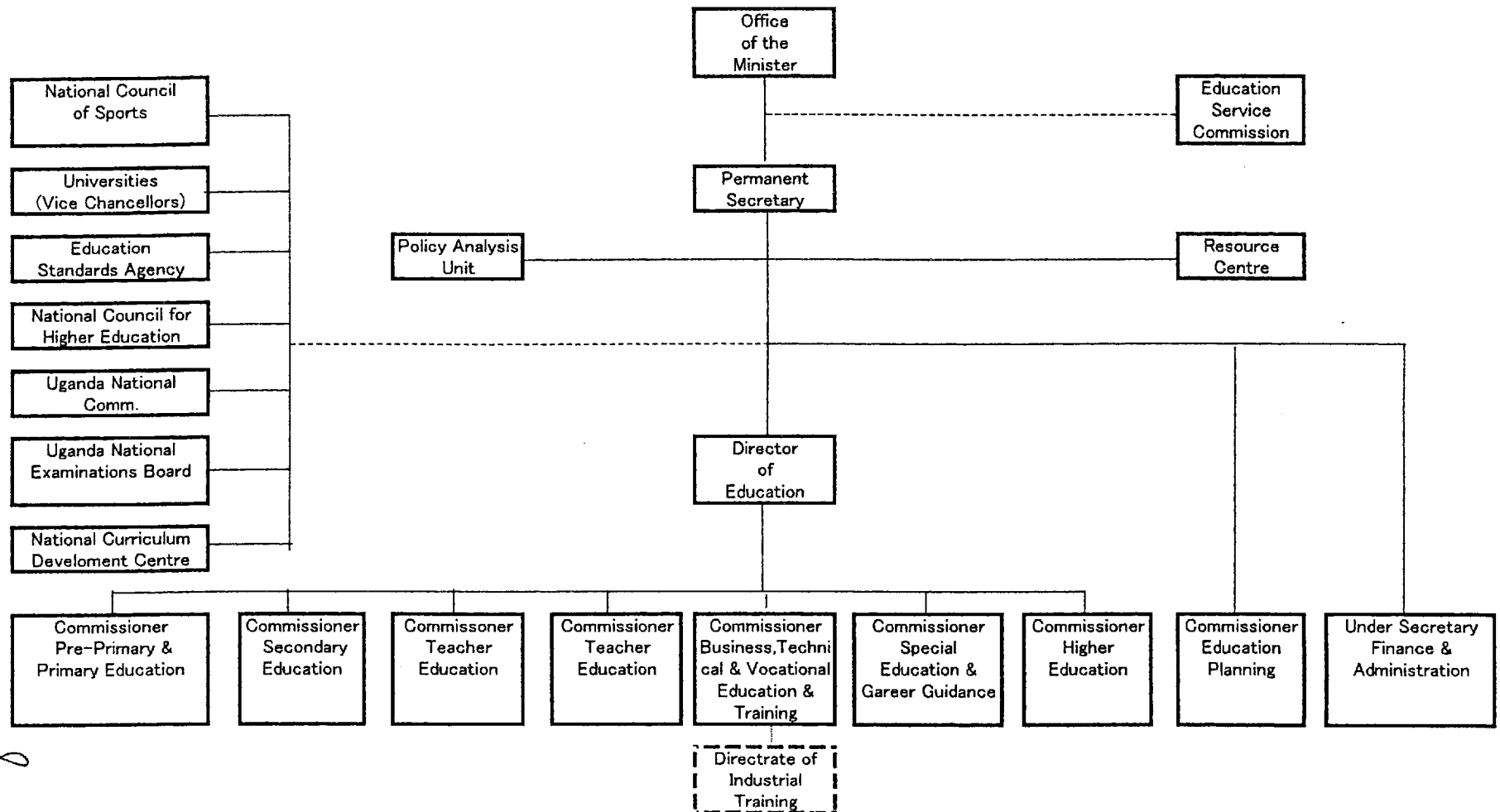
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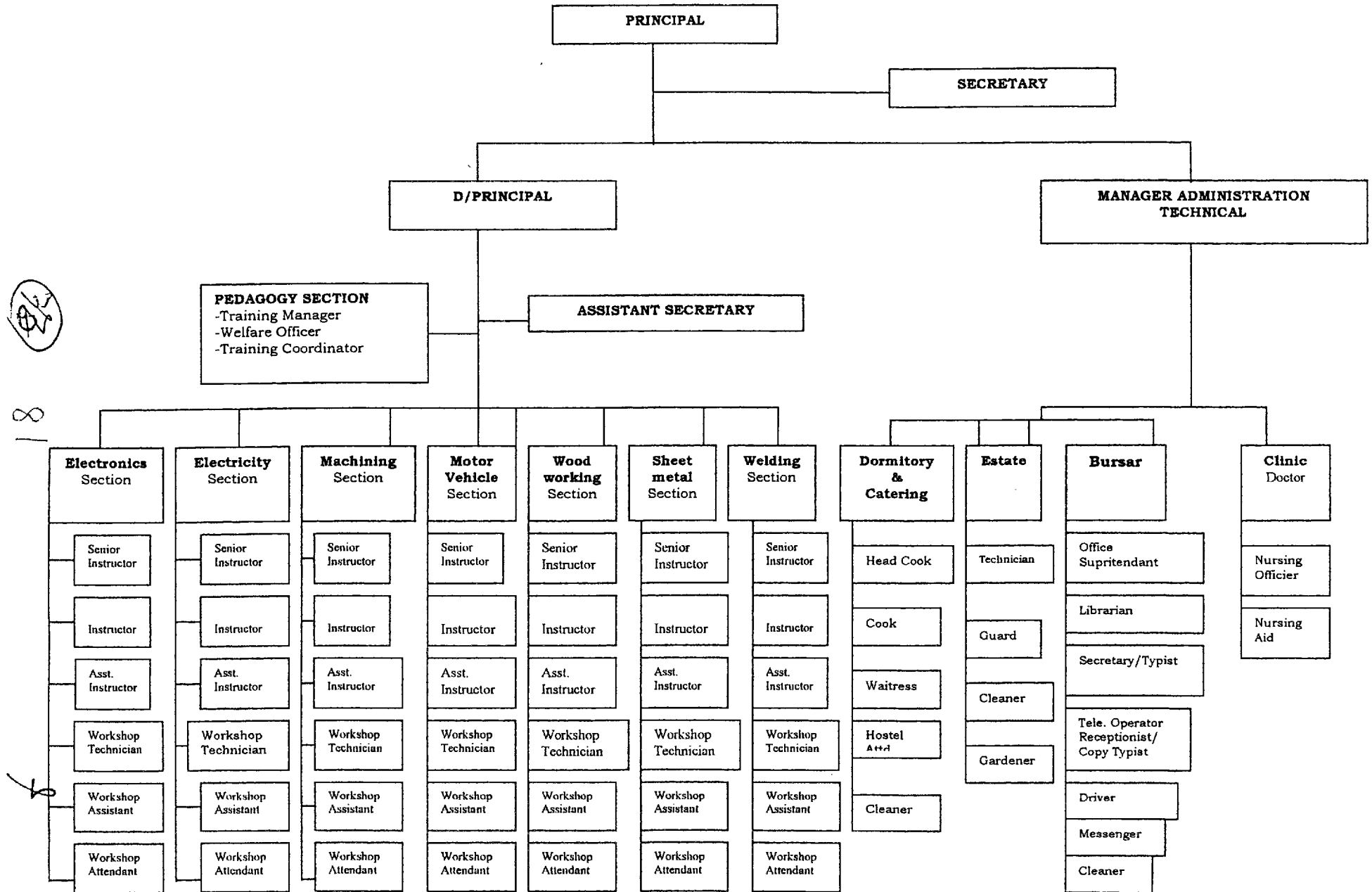
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Annex 12.2

Organization Chart - Ministry of Education and Sports



NAKAWA VTI ORGANISATION CHART (General)



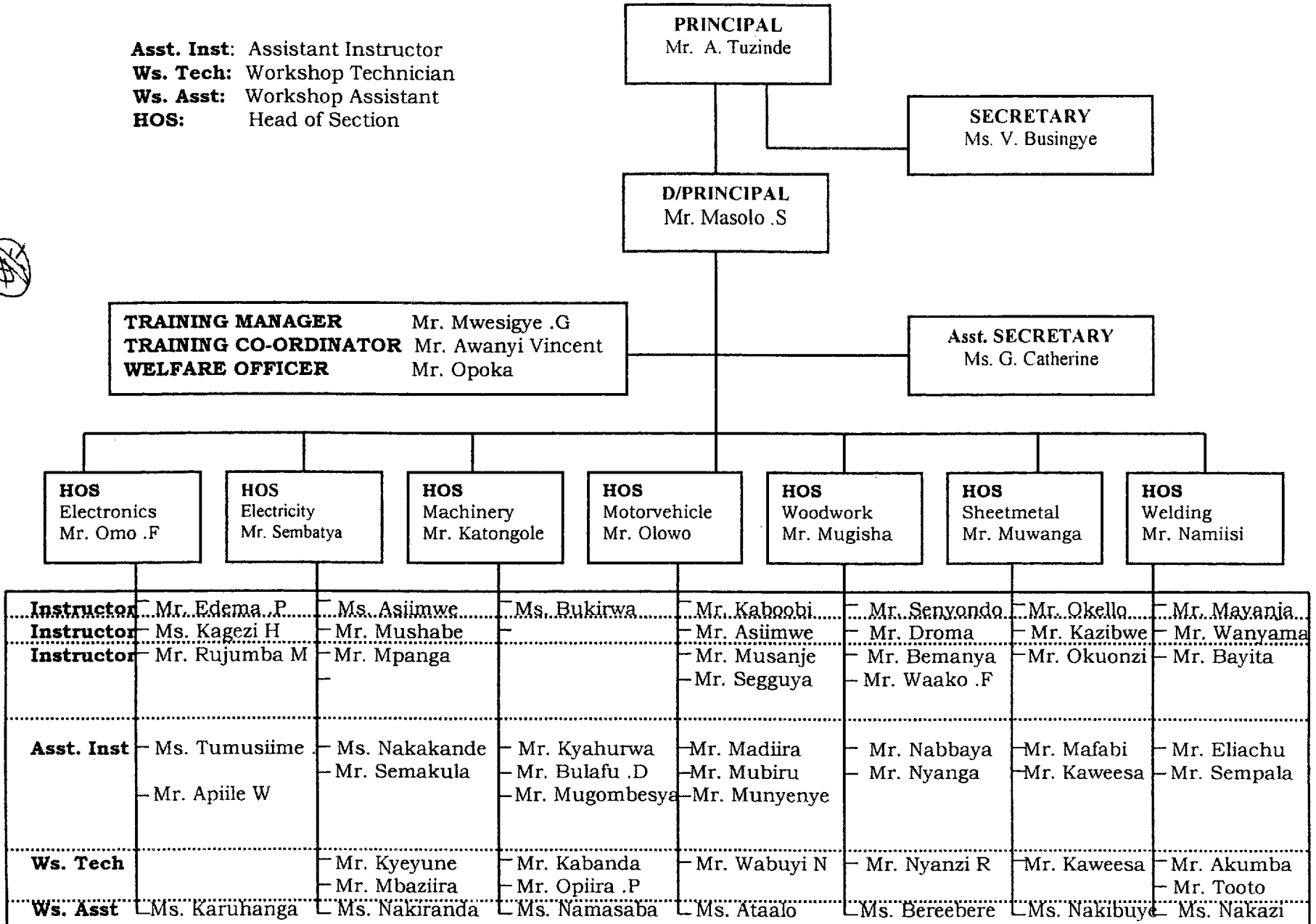
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NAKAWA VTI ORGANISATION CHART (Training Division)

Asst. Inst: Assistant Instructor
Ws. Tech: Workshop Technician
Ws. Asst: Workshop Assistant
HOS: Head of Section



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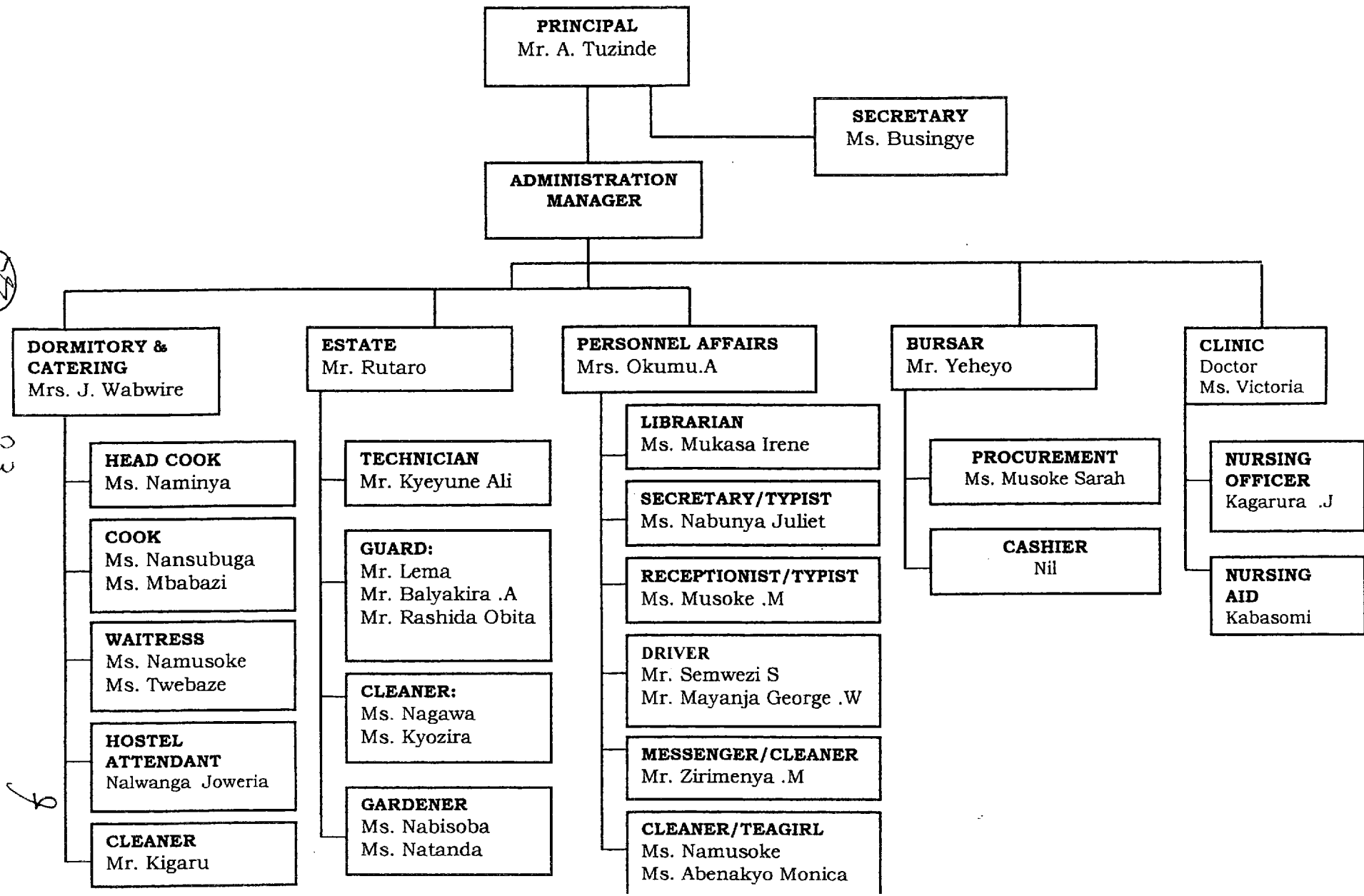
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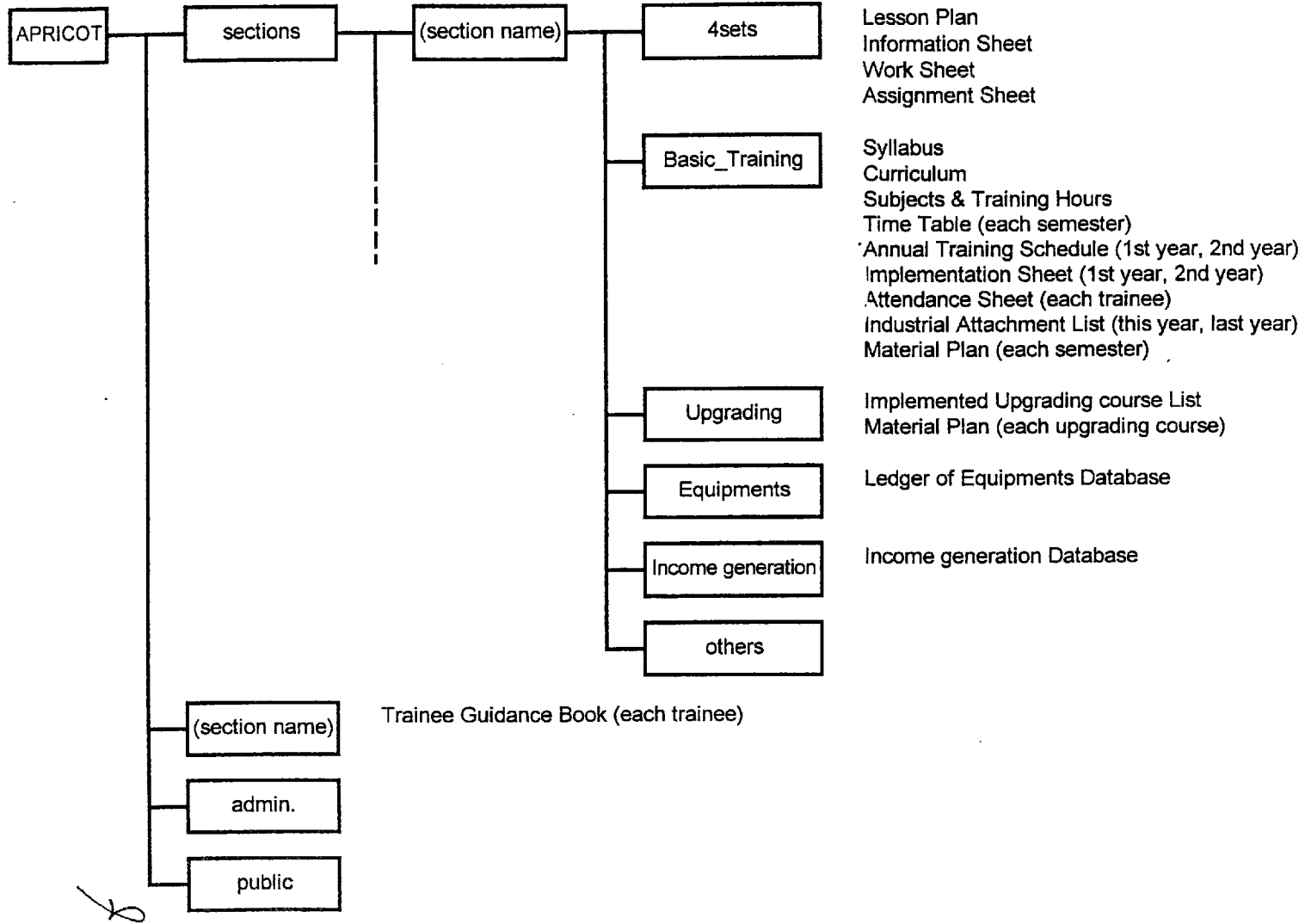
NAKAWA VTI ORGANISATION CHART (Administration Division)

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