



**TOGETHER**  
*for a sustainable future*

## OCCASION

This publication has been made available to the public on the occasion of the 50<sup>th</sup> anniversary of the United Nations Industrial Development Organisation.



**TOGETHER**  
*for a sustainable future*

## DISCLAIMER

This document has been produced without formal United Nations editing. The designations employed and the presentation of the material in this document do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations Industrial Development Organization (UNIDO) concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or its economic system or degree of development. Designations such as “developed”, “industrialized” and “developing” are intended for statistical convenience and do not necessarily express a judgment about the stage reached by a particular country or area in the development process. Mention of firm names or commercial products does not constitute an endorsement by UNIDO.

## FAIR USE POLICY

Any part of this publication may be quoted and referenced for educational and research purposes without additional permission from UNIDO. However, those who make use of quoting and referencing this publication are requested to follow the Fair Use Policy of giving due credit to UNIDO.

## CONTACT

Please contact [publications@unido.org](mailto:publications@unido.org) for further information concerning UNIDO publications.

For more information about UNIDO, please visit us at [www.unido.org](http://www.unido.org)

RESTRICTED

18603

DP/ID/SER.A/1388  
18 September 1990  
ORIGINAL: ENGLISH

RESEARCH AND DEVELOPMENT ON VARIOUS METHODS  
OF SPINNING SHORT STAPLE COTTON

DP/VIE/86/014/11-01

VIET NAM

Technical report: Third mission of the Chief Technical Adviser\*

Prepared for the Government of Viet Nam  
by the United Nations Industrial Development Organization,  
acting as executing agency for the United Nations Development Programme

Based on the work of Roy Nield, Chief Technical Adviser

Backstopping officer: J. P. Moll, Agro-based Industries Branch

United Nations Industrial Development Organization 4  
Vienna

---

\* Mention of company names and commercial products does not imply the endorsement of UNIDO. This document has not been edited.

V.90 87750

TABLE OF CONTENTS

	<u>Page No</u>
ABBREVIATIONS	1
I EXECUTIVE SUMMARY	2
II INTRODUCTION	3
III RECOMMENDATIONS	4
IV ACTIVITIES AND OUTPUTS	5
Purpose of the mission	5
Programme	5
Counterparts	5
Meetings, seminars, etc.	5
Inputs	6
Budget	6
Documentary outputs	6
V CONCLUSIONS	7
VI ACKNOWLEDGEMENTS	8
ANNEXES	
1. Progress report	9
2. Equipment	11
3. Training	12
4. Experts	13
5. Work Plan	14
6. Job Description 11-02	15
7. Government Budget	16
8. Project Budget	17

ABBREVIATIONS

BSO	Back Stopping Officer (UNIDO)
CTA	Chief Technical Adviser
Est	Estimate
JD	Job Description
MOLI	Ministry of Light Industries
NPD	National Project Director
Prodoc	Project Document
Req xx	Requisition No. xx
SIDFA	Senior Industrial Development Field Adviser
TOR	Terms of Reference
TPR	Tri-Partite Review
TRI	Textile Research Institute (Hanoi)
TRSI	Textile Research Sub-Institute (Ho Chi Minh City)
UTE	Union of Textile Enterprises

## I. EXECUTIVE SUMMARY

The mission took place during July and August 1990, coordinated with a mission to Project DF/VIE/86/015 in Ho Chi Minh City.

The project concept remains very relevant to the Government's Development Plan which emphasises the need to expand the production of consumer goods especially clothing by increased utilization of indigenous raw materials.

A progress report by the CTA is attached as Annex 1.

Output 1, cotton testing laboratory, will be fully produced after completion of the expert missions.

Output 2, testing of yarn properties, will be produced after delivery of the Uster evenness and Tensorpid yarn strength testers and completion of the expert missions.

Output 3, pilot plant, should be produced before the end of 1990 when the building will be completed and the 2 major items of equipment (ordered early 1989) installed.

In connection with Output 4, the TRI has already made a set of prototypes which is being field-tested in a village under the supervision of the returned fellowship group and the Expert who was fielded in August 1990.

The main objectives will be achieved within the expected life of the project (3 years from 8/8/88).

It is recommended to continue implementation of the project according to the work plan given in Annex 5.

The most suitable date for the next TFRs for this project and 015 is 13 December 1990. The following timetable is proposed:-

Oct 24	CTA arrives in Hanoi and works in Project 014
Nov 18	CTA travels to HCM City and works in Project 015
Dec 9	Back Stopping Officer (BSO) arrives HCM City
10	Visit to project 015. Meeting with NPD and CTA
11	BSO and CTA travel to Hanoi
12	Visit to Project 014. Meeting with NPD and CTA Visit to UNDP. Meetings with Res Rep and SIDFA
13	Visit of delegates to Project 014 TFR for 014. TFR for 015
14	Final discussions with BSO
15	BSO departs from Hanoi to Vienna
18	CTA departs from Hanoi to UK.

It is suggested that the proposed Joint Evaluation Mission be postponed until March/April 1991 when an evaluation will be more meaningful.

## II INTRODUCTION

The development objective of the project is to increase the availability of good quality textiles for domestic consumption which is in line with the Government's development plan for the period 1986-90 which emphasizes the need to expand the production of consumer goods - especially clothing - by means of increased utilization of indigenous raw materials.

The immediate objective is to strengthen the capability of the Vietnam Textile Research Institute in evaluating cotton fibre and conducting spinning development work with particular emphasis on the use of short staple cotton.

These objectives were elaborated upon in the first mission report of the CTA (DF/ID/SER.A/1152) dated 13 February 1989.

### III RECOMMENDATIONS

1. Continue implementation of the Project according to the Work Plan (Annex 5) and increased Budget (Annex 8).
2. Complete the civil engineering work in the pilot plant complex as soon as possible (NFD).
3. Arrange for the entire spinning department (except the blowroom) to be air-conditioned. (Government).
4. Officially inform UNDP of the increased budget (MOLI).
5. Inform UNIDO of the increased budget (UNDP).
6. Order the Uster Tensorapid as soon as possible (UNIDO).
7. Manufacture locally a set of nep counting boards and templates (NFD).
8. Reorder the periodicals for a further 2 years (UNIDO).
9. Issue revised JD for post 11-02 Textile Testing (UNIDO).
10. Field the Textile Testing expert for 1 month in November 1990 to overlap with the next mission of the CTA (UNIDO).
11. Field the Blowroom technician as soon as possible after delivery of the equipment (UNIDO).
12. Prepare for the arrival of the experts (NFD).
13. Provide the CTA with a contract for his next mission to Hanoi and HCM City (approx 1/2 time in each) as follows:  
  
Duration: 10 weeks (incl. travel time/completion of reports at home base) over a period between 17 October 1990 and 10 January 1991.  
  
Travel: St Annes on Sea/London (2 days for visa purposes)/Hanoi/Ho Chi Minh City/Hanoi/St Annes on Sea (5 days at home base for completion of reports). For itinerary in Vietnam please see page 2. (UNIDO).
14. Organise the next TPR, co-ordinated with Project 015, in Hanoi on 13 December 1990. (UNDP, Hanoi).
15. Postpone the Joint Evaluation Mission, co-ordinated with project 015, until March/April 1991. (UNDP).
16. Prepare to discuss the possibility of a project extension at the next TPR. (Government, UNDP, UNIDO).

#### IV. ACTIVITIES AND OUTPUTS

##### Purpose of the Mission

To review progress since the last mission and the follow up of the recommendations in the previous report and the decisions taken at the TPR.

To clarify outstanding issues and decide what needs to be done.

To discuss the training programmes and debrief the trainees.

To up-date the work plan.

To advise the NPD on the work to be carried out in the absence of the CTA.

To revise the Job Descriptions of the experts where necessary.

To assist in preparation of a PPER which is required in September for the TPR in December.

To revise the TOR for a future Joint Evaluation Mission.

To prepare a mission report recording all decisions taken and recommending the actions necessary, and by whom, to expedite further implementation of the project.

##### Programme

The mission was combined with a mission to the TRSI in Ho Chi Minh City, which is receiving assistance through project DP/VIE/86/015.

##### Counterparts

The NPD is Dr Mme Nguyen Thi Bau who is now also the Director of the TRI.

##### Meetings, Seminars, etc.

Frequent meetings were held with NPD and her staff. All outstanding matters were fully discussed.

The members of the following fellowship groups were de-briefed:

- Textile Testing
- OE Spinning
- Blowroom

All the items of equipment supplied were examined.

The status of the project was discussed with the SIDFA.



### Inputs

The project inputs are elaborated in Annex 1.

### Budget

The budget had been increased by USD119.169 following the TPR. We were informed that the Government had authorised UNDP to increase the budget by a further USD 23,516 to cover the cost of the Tensorapid tester. The latest revision is attached as Annex B.

### Documentary Outputs

Progress report dated July 1990 (Annex 1).

Draft PFER which is required in September for the next TPR on 13 December 1990.

Revised Terms of Reference (TOR) for a future Joint Evaluation Mission.

Third Mission Report of CTA.

Schedules detailing the present status of the project as regards equipment, training and experts (Annexes 2, 3 and 4 of this report).

A detailed work plan for the remainder of the project (Annex 5)

The latest revision of the Project budget (Annex 8).

Revised Job Description for the expert in Textile Testing and Quality Control Post 11-02 (Annex 6).

## V CONCLUSIONS

Taking into account constraints outside the control of the project management, reasonable progress has been made during the Project's active life.

Implementation of the project has been controlled to a large extent by having to wait for delivery of the 2 major items of equipment (OE spinning machine and Blowroom line). It was known from the start that the delivery schedules would be long (up to 16 months).

The equipment budget has been a problem all along due largely to the delay in starting implementation and the steep rises in equipment prices at that time. Sufficient funds have now been made available for all the essential equipment.

Implementation of the Project should be continued as outlined in this report in which case it is expected that the objectives will be reached within the intended life of the project (3 years from 8/8/88).

## VI ACKNOWLEDGEMENTS

The author wishes to thank all who participated in the work of this mission for their co-operation and valuable advice and in particular:

Dr Pham Hoang Ninh	Director of the TRI (retired).
Dr Mme Nguyen Thi Bau	NPD and Director of the TRI.
Mr J M Bonnamy	SIDFA, UNDP
Mr Tran Trong Phung	Programme Officer, UNDP.

PROGRESS REPORT DATED JULY 1990

Government Contribution

In 1986, the approved budget for the Government contribution was about 17 million dong. This has now risen to 2,152 million dong by the end of 1990. This huge increase is partly due to inflation but mainly due to improvements in the buildings and the purchase of additional machines for the pilot plant which will complement the equipment supplied by UNIDO. Details of the Government contribution are given in Annex 7.

Buildings

The TRF has provided a large laboratory to house the fibre and yarn testing equipment but the air-conditioning unit supplied through the project has not yet been installed.

The special room for the OE Spinner, which needs a clean environment to function properly, has been completed. It is being air conditioned by one of the units supplied by UNIDO.

The room to house the blowroom equipment is almost complete

It is hoped that the Government will make funds available in 1991 to allow the entire spinning department (except the blowroom) to be conditioned, as a controlled environment is essential for scientific work in spinning.

A small office block has been built in the pilot plant complex.

A new building has been constructed as a materials store and to accommodate other pilot plant equipment in the future.

The surrounding area is being cleared and concrete roadways constructed.

Equipment

The fibre testing equipment is operational.

The OE spinner will be installed in August/September 1990.

The blowroom should be delivered in September and installed in October/November 1990.

Books and periodicals have been being delivered as planned. The monthly news letter has been improved. The subscriptions should be renewed for a further 2 years.

Details of the UNIDO equipment are given in Annex 2.

The Government have provided the following items of equipment:

- 2 drawframes from the USSR (installed)
- 1 lap former - 1 comb from Textima (not yet installed)
- 1 microcomputer
- 1 offset printing machine (for the News letter, etc.)

Based upon the experience gained during the Study Tour and Fellowships in Appropriate Spinning Technology, the TRI have constructed a set of manually-operated spinning equipment which is now being installed in a village for trials. The hand-spinning equipment (Rec 88/6) has therefore been cancelled.

#### Training

The training programme of 2 Study tours (9 persons) and 5 fellowship groups (15 persons) has been successfully completed. Details of training are given in Annex 3.

#### Experts

It was always intended to field the experts after completion of training and delivery of the equipment. Accordingly, all experts should be fielded during the remainder of 1990 or early 1991. Details of the experts are given in Annex 4.

#### Work Plan

The agreed work plan for the rest of the project is given in Annex 5.

#### Budgets

The UNDP budget was increased by USD 119,169 in accordance with a decision taken at the last TFR meeting. We have been informed that the Government intend to authorise a further increase of USD 23,516 to compensate for the decline in the value of the US dollar. The latest Project budget revision is attached as Annex 8.

The Government budget, which has not changed, is attached as Annex 7.

#### Yarn Testing and Certification for Export

After delivery of the Uster evenness tester and the Tensorapid, the TRI will have the capability of carrying out all the normal tests for quality certification to international standards.

DP/VIE/86/014

Research and Development on spinning short staple cotton

EQUIPMENT - Revised July 1990

(\* = Already Delivered)

Req No	Item	Supplier	Cost(\$)	Remarks
88/1	Landcruiser + Spare parts	Toyota	16,704	* *
88/2/1	Digital fibrograph	SDL)	57,926	*
/5	Fineness/maturity	SDL)		
/2	Fibre opener	SDL	6,022	*
/3	Pressley Tester	Baer)	6,154	*
/4	Micronaire	Baer)		*
/6	Lab roller gin	Platt/SL	6,491	*
88/3	2xAir conditioner	BB/York	19,391	*
88/4/2	Blowroom line	Truetzschler	317,793	Del Sep 90
88/5/1	OE spinner	Schlafhorst	148,700	*
88/6	Hand spinning set	Cancelled		Made by TRI
88/7	PP copier	Kwan	1,538	*
88/8/1	Evenness tester	Uster	84,561	Ordered
/2	Strength tester	Uster	85,292	Estimate
88/10	Books/periodicals	Munksgaard	2,395	Re-order



DF/VIE/86/014

Research and Development on spinning short staple cotton

EXPERTS - 1990 AND FUTURE - Revised July 1990

Post no	Title	m/m	Remarks
11-01	CTA	4	Dr R. Nield appointed. Next missions Oct 90, Mar 91 and Nov 91. Co-ordinate and share cost with Project DF/VIE/86/015.
11-02	QC/Testing	1+1	Mr J. Mitchell appointed. Field for 1 month Nov 1990.
11-03	Blowroom	(1)	Expected October 1990.
11-04	OE Spinning	(1)	Mr Sit Duen Tai fielded August 1990.
11-05	Appropriate Spinning Technology	1	Mr Sharma fielded August 1990. Extended 1 week.

( ) = included in price of equipment



DF/VIE/86/014

Research and Development on spinning short staple cotton

WORK PLAN - PROJECT INPUTS AND ACTIVITIES - Revised July 1990

	1989	1990	1991
<u>Personnel</u>			
11-01 Chief Technical Adviser	—	—	—
11-02 QC/Testing		—	—
11-03 Blowroom Technician		—	
11-04 Open End Spinning Expert		—	
11-05 App/Spinning Technology		—	
<u>Fellowships</u>			
Fibre testing. Bolton 3x3m/m		—	
Blowroom. Truetzschler 3x1m/m	—		
OE Spinning. Schlafhorst 2x2m/m		—	
Uster Equipment. Uster 2x1m/m	—		
App/Spinning Technology 5x3m/m	—		
<u>Study Tours</u>			
Research & Development (29) 4x1m/m			—
App/Spinning Technology (52) 5x1m/m	—		
<u>Equipment</u>			
Fibre Testing	—		
OE Spinner		—	
Blowroom		—	
Yarn Evenness tester		—	
Tensorapid tester			—
Hand Spinning			
<u>Activities</u>			
Fibre testing			
OE Spinning		—	
Short Fibre Spinning R & D			—
Design of A/T machines	—		
Manufacture of A/T prototypes		—	
Field testing of prototypes			—
<u>Evaluation of Project</u>			
			—

UNITED NATIONS

UNITED NATIONS INDUSTRIAL DEVELOPMENT ORGANISATION  
UNIDO

Job Description  
DP/VIE/014/11-02/J13102

Post title           Textile testing and Quality Control expert

Duration             1 month  
Date required       1 November 1990

Duty Station         Hanoi with possibility of travel within country.

Purpose of project     To strengthen the Textile Research Institutes capability of conducting cotton fibre evaluation and spinning development work, with particular emphasis on the use of short staple cotton. This will enable the Institute to advise spinning mills on optimum processing conditions when using such cottons and to develop an improved hand spinning technology for use in rural areas.

Duties                The expert will work in co-operation with counterpart personnel and under the leadership of the CTA and will specifically be expected to assist the national staff to:

1. check all project equipment is correctly installed and calibrated.
2. re-inforce the technical skills already acquired through fellowship training.
3. organise the work of the laboratory and prepare job descriptions for the staff.
4. establish testing routines in line with the best international standards.
5. evaluate Vietnamese and imported cottons.
6. evaluate Vietnamese and imported yarns and fabrics.
7. begin to compile experience statistics.
8. establish quality assurance & certification procedures for imported cottons and exported yarns.

Qualifications: At least 10 years experience in fibre, yarn and fabric testing and quality control and certification for export. Wide knowledge of quality standards expected in importing countries.

Language             English

Background Information     As in Job description for post 11-01.

DF/VIE/86/014

Research and Development on spinning short staple cotton

GOVERNMENT BUDGET - Revised December 1989

Units: Dongs x 1,000

Item	Original Budget	Actual 1989	Estimated 1990
1. Salaries of fellows and personnel expenses	1,440	10,000	20,000
2. Value of existing equipment	11,000	600,000	
3. Cost of new equipment	1,260		
- Comber		400,000	
- 2 Drawframes		320,000	
- Microcomputer		12,000	
- Offset printing machine		128,000	
4. Installation of equipment		11,000	30,000
5. Manufacture of hand spinning equipment		12,000	20,000
6. Buildings			
Value of laboratory + plant		358,000	
House for expert + training		30,000	
Improvements to buildings	550	12,000	120,000
7. Raw materials and electricity	1,000	1,500	50,000
8. Miscellaneous expenses	800	2,500	5,000
<b>TOTAL</b>	<b>16,650</b>	<b>1,907,000</b>	<b>245,000</b>

PROJECT NUMBER: P/VITE/BB/014

BACK STOPPING OFFICER M. MOLL  
PROJECT REGION: M  
PROJECT STATUS: O - ONGOING  
PROJECT ELEMENT CODE: 13102  
FIRST ISSUED: 87-05-23 LAST UPDATED: 90-07-13

DETAIL REPORT ON PROJECTS AS AT 1990-07-31  
BY PROGRAM ELEMENT AND COUNTRY  
RESEARCH AND DEVELOPMENT ON METHODS OF SPINNING SHORT STAPLE  
COTTON

RUN-DATE: 1990-08-07  
UNIDO - UNAP02/8

PROJECT TITLE:

BUDGET LINE	DESCRIPTION	TOTAL ALLOTMENT M/W (1)	CURR YR PHASING M/W (3)	PRIOR YEAR EXP. M/W (6)	CURR YR DISB. M/W (7)	BAL. CURR YR OBL. M/W (8)	COMMITTED FUTURE YEARS (11)	BALANCE CURR.YR (12)	UNCOMMITTED BALANCE (13)	YTD IMPL VERSUS PHASING (14)
11-01		8.7	2.0	1.7	0.0	0.0	0.0	(4.6)	(1.0)	80 XMM
11-02		19,400	9,400	0.0	0.0	0.0	0.0	3,200	17,924	
11-03		9,400	9,400	0.0	0.0	0.0	0.0	9,400	0.0	
11-04		14,143	0.0	0.0	0.0	0.0	0.0	0.0	14,143	
11-05		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-06		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-07		112,018	48,748	2.1	0.0	1,178	0.0	15,210	48,442	38 XMM
11-08	INTEXPERT	0.0	0.0	0.0	0.0	0.0	0.0	2,808	0.0	
11-09		10,000	2,808	0.0	0.0	0.0	0.0	2,808	0.0	
11-10	OTHERPERS	10,000	2,808	0.0	0.0	0.0	0.0	2,212	2,212	23 X8
11-11		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-12	SUR PY OS	548	0.0	0.0	0.0	0.0	0.0	0.0	548	
11-13		548	0.0	0.0	0.0	0.0	0.0	0.0	548	
11-14	PERSONNEL	121,488	51,651	2.1	0.0	2,178	0.0	17,423	48,884	66 X8
11-15		104,088	53,845	0.0	0.0	0.0	0.0	53,845	104,088	
11-16		0.0	0.0	0.0	0.0	1301	0.0	13,012	13,012	
11-17		0.0	0.0	0.0	0.0	308	0.0	7,423	7,423	
11-18		0.0	0.0	0.0	0.0	308	0.0	7,423	7,423	
11-19		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-20		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-21		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-22		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-23		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-24		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-25		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-26	FELLOWS	104,088	53,845	0.0	0.0	1301	0.0	13,012	17,022	104 X8
11-27		78,532	0.0	0.0	0.0	4817	0.0	2,282	78,532	
11-28		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
11-29	STUDYTOUR	78,532	0.0	0.0	0.0	0.0	0.0	778	778	
11-30		3,604	0.0	0.0	0.0	0.0	0.0	0.0	3,604	

PAGE 1276

RUN-DATE: 1990-08-07  
UNIDO - UNAP03/8

PROJECT NUMBER: OP/VIE/88/014

BACK STOPPING OFFICER: MR MOLL  
PROJECT REVISION: M  
PROJECT STATUS: O - ONGOING  
PROGRAM ELEMENT CODE: J13102  
FINANCIAL YEAR ISSUED: 87-08-31

DETAIL REPORT ON PROJECTS AS AT 1990-07-31  
BY PROGRAM ELEMENT AND COUNTRY  
RESEARCH AND DEVELOPMENT ON METHODS OF SPINNING SHORT STAPLE  
COTTON

LAST UPDATED: 90-07-13

BUDGET LINE	DESCRPT.	TOTAL ALLOTMENT M/W (1)	CURR YR PHASING M/W (3)	PRIOR YEAR EXP. M/W (6)	CURR YR EXP. M/W (7)	CURR YR DISB. M/W (8)	BAL. CURR YR OBL. M/W (9)	COMMITTED FUTURE YEARS (11)	BALANCE CURR YR (12)	UNCOMMITTED BALANCE (13)	YTD IMPL VERSUS PHASING (14)
38-88	SUR PY CB	0.0	0.0	0.0	0.0	0.0	0.0	0	3,030-	3,030-	106 X6
39-88	TRAINING	0.0	0.0	0.0	0.0	11888	0.0	48177	0	3,283-	
41-00		0.0	0.0	0.0	0.0	0	0.0	0	0	0	
41-88	EXPENDABL	0.0	0.0	0.0	0.0	0	0.0	0	0	0	
42-00		0.0	0.0	0.0	0.0	0	0.0	0	188,978	741,440	86 X6
42-01		0.0	0.0	0.0	0.0	11802	0.0	84881	72,812	692,628-	
42-88	NONEXPEND	0.0	0.0	0.0	0.0	0	0.0	0	0	1,702-	
48-00		0.0	0.0	0.0	0.0	0	0.0	0	0	0	
48-02	SUR PY CB	0.0	0.0	0.0	0.0	0	0.0	0	72,812	72,811	86 X6
48-88	EQUIPMENT	0.0	0.0	0.0	0.0	11802	0.0	84881	0	0	
51-00		0.0	0.0	0.0	0.0	0	0.0	0	2,200	3,230	
51-21		0.0	0.0	0.0	0.0	24	0.0	0	0	0	
51-40	SUNDRIES	0.0	0.0	0.0	0.0	24	0.0	0	2,178	2,818	1 X6
58-00		0.0	0.0	0.0	0.0	0	0.0	0	0	0	
58-01	SUR PY CB	0.0	0.0	0.0	0.0	0	0.0	0	0	0	
58-88	MISC.COST	0.0	0.0	0.0	0.0	24	0.0	0	2,178	2,818	1 X6
99-88	PROJ TOT.	11.1	8.0	3.1	0.8	38770	1.0	151820	89,381	120,882	87 X6